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ABSTRACT

This book contains reports on the teaching of and research in economics in nine countries: India, Indonesia, Malaysia, Nepal, the Philippines, Republic of Korea, Sri Lanka, Thailand, and Viet Nam. Each report covers the historical development and growth of the discipline in the country; the development of infra-structures for teaching and research; and major trends in research and problems associated with the development of the profession. An introductory essay provides an overview of economics in the Asia Pacific region. (DB)

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Social and Human Sciences in Asia and the Pacific
RUSHSAP Series on Occasional Monographs and Papers **14**

ECONOMICS IN ASIA

Status Reports on Teaching and Research in Nine Countries

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ECONOMICS IN ASIA

Status Reports on Teaching and Research in Nine Countries

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PREFACE

Unesco has recently completed a series of country surveys on the status of social sciences in various countries in Asia and the Pacific, the results of which were published in four issues of *Social Sciences in Asia* (Reports and Papers in the Social Sciences, 1976-1980). For each country, the social sciences were reviewed under four headings: historical background; institutional framework for teaching and research; major issues in the social sciences; perspectives for social science development; and recommendations for regional and international co-operation. This set of surveys provided a basic source of information about social science infrastructures and policies. Both social scientists as well as governments have found the series quite useful. These have been updated and published as a single volume, from the Unesco Press, Paris.

As a sequel to these general surveys, Unesco launched a series of surveys on trends in particular social science disciplines. The first set of reports under this series was devoted to the twin disciplines of Sociology and Social Anthropology in twelve countries in Asia and the Pacific, and was carried out in 1979-1980. In the year 1981, similar surveys were planned for Political Science, Economics, and Philosophy, and in 1984 for International Law.

The purpose of this set of surveys is to make available to the reader a comparative picture of the growth of various social science disciplines in the Asia-Pacific region.

It is a happy coincidence that all the volumes on individual disciplines have come out almost simultaneously. The first one to appear in late 1984 was the volume on *Political Science in Asia and The Pacific*. Another on *Sociology and Social Anthropology in Asia and the Pacific* was published in January 1985 as co-publication of Unesco with Messrs Wiley Eastern Ltd. In July of 1985, the third volume on *Teaching and Research in International Law* came out under RUSHSAP Series. This volume in *Economics* is the fourth one. Yet another on *Philosophy*, covering 15 countries of the region is under print, to be published from Unesco, Paris.

Present volume contains reports on the status of teaching and research in Economics in nine countries of the Asia-Pacific region. These reports depict the regional component of the history of this discipline. Written specially for this volume, these essays have followed a common guideline and thus provide an opportunity for comparison. This is first venture of its kind in the region; it reviews the growth of economics and makes available at one place the information about the way the discipline has grown and taken roots in different countries, the problems that it faces, and the future directions it proposes to take. In the preparation of this volume, a substantial financial contribution was made by the International Development Centre of Canada, which is gratefully acknowledged.

In editing these essays, I was assisted by Dr M. Tun Lwin of the Educational Planning and Management Services Unit of the Unesco Regional Office for Education in Asia and the Pacific, Bangkok. He has also kindly done the overview paper synthesising the elements drawn from different country reports so as to provide a regional profile of the discipline. We are grateful for his contribution and collaboration in this task.

9 October 1985
Unesco RUSHSAP
Bangkok

Yogesh Atal
General Editor
RUSHSAP Series
on Occasional
Monographs

ONE

ECONOMICS IN ASIA : AN OVERVIEW: *M. Tun Lwin*

The present monograph consists of surveys on teaching and research in economics in nine countries: India, Indonesia, Malaysia, Nepal, the Philippines, Republic of Korea, Sri Lanka, Thailand and Viet Nam. Each survey covers the historical development and growth of the discipline in the country; the development of infra-structures for teaching and research; and major trends in research and problems associated with the development of the profession. The purpose of this essay is to provide an overview with respect to the issues and perspectives in the development of the discipline of Economics in Asia, based on the country status reports that will follow.

I. Historical Development and Growth of the Discipline

The growth of the discipline of Economics in Asia has invariably been influenced and shaped by the peculiar historical forces of each country. Such influences over different groups of countries may be broadly perceived as follows: India, Malaysia, Napal, and Sri Lanka received, by and large, British influence; Indonesia, the Dutch influence; Viet Nam, the French influence; the Philippines, the Spanish and American influence; the Republic of Korea, the Japanese and American influence. Thailand had exposure to several Western countries in the past, but the predominant one was to the United States. Let it also be said that in all of these countries, irrespective of their colonial past, the recent exposure has been mainly to the academic tradition of the United States, and this is not peculiar to economics alone; all social sciences have experienced such exposure which has shaped their orientation and approach.

This is of course, not to deny the multiplicity of exposures in the post-independent phase beginning somewhere in the mid 1940s. Thus, there is considerable intermingling and intermixture of different academic traditions in the present day economics in Asia.

It is in this context that we would attempt to trace the development of different branches of economics in the region.

A. Descriptive Economics and Political Economy

In India, Malaysia, Nepal and Sri Lanka and, for that matter, Burma, Bangladesh and Pakistan as well, the origin of economic thought can be traced back to the development of descriptive economics and political economy.

Prominent in the economics curriculum in Sri Lanka was descriptive economics including a study of (i) the forms and problems of modern economic organization; and (ii) aspects of the economy of Britain and Sri Lanka.

In Nepal, for many years after economics was introduced, the subject was taught as "political economy". The admixture of politics and economics in the curriculum continued until 1943 when economics instruction was separated from that of the Political Science.

In the case of Viet Nam, economic thought was even more deeply rooted and admixed with political and social philosophy. Professor Dao Van Tap pointed out that the writing of Nguyên Ai Quôc (who is better known as President Hô Chi Minh) on the economic, political and social life of Viet Nam were later incorporated into a historic document entitled: "Political Programme of the Vietnamese Communist Party", published in 1930, at the founding of the Party.

During the Dutch colonial rule in Indonesia, economics was offered as a support subject within the college of law and social sciences in Jakarta and was taught by Dutch professors. The emergence of political economy as a branch of the economics discipline "suffered an episode of discontinuity in the sixties, when political atmosphere was very suspicious against economic theories coming from the West, namely those related to the capitalistic system", leaving a vacuum. The vacuum, however, was not filled by another brand of social-economic theory such as Socialist or Marxian theories. The vacuum, in fact, gave large opportunities for the development of technical aspects of economics, such as input-output analysis, business administration, and planning.

The two features which distinguish the Philippine higher education system from other countries are: (i) its very large size relative to its population and stage of development and (ii) the predominance of private colleges and universities. The economics taught in the majority of institutions in the earlier phase was more descriptive than analytical. The fundamental aspects of national resource allocation and economic development received little theoretical and even descriptive analysis in economic literature in the country.

During the Japanese occupation, Korean economists were much concerned with agricultural economics and history. Professor Han Seung Soo pointed out that "in the field of economic history, the Marxian interpretation of history dominated the teaching and research activities of scholars at colleges and universities. Even in theoretical economics, most of the contributions were made in the form of Marxian economic theory. The history of economic science in Korea during the period between liberation and the Korean War was characterized by confusion, conflict, and reconstruction. The Korean War in 1950 brought a drastic transformation of the economics profession in Korea. The Marxist economists were either compelled, or opted on their own, to go to the North. The economics faculties at colleges and universities had to be completely overhauled. Soon after the Korean War, a group of eminent professors started to reconstruct the economics profession in Korea and tried to eliminate the ideological and political elements in economic theory so as to rehabilitate economics as a science.

Similar to Indonesia, the teaching of economics in Thailand at the University of Moral and Political Science (UMPS) in 1933 was associated with law and public administration. All students at the university registered first for a bachelor of law degree. Two courses in economics were introduced at the bachelor degree level, one dealing with economic doctrines and the other with economic principles. Students could work for a master's degree in economics after finishing the law degree.

B. Economic Theory and Applied Economics

A significant phase in the development and growth of the discipline was the surfacing of "economic theory", "economic analysis", "applied economics" etc. in the curriculum of economics teaching in higher education. It was a significant phase in that knowledge and insights into the functioning of the economic systems, particularly in terms of price mechanism and the allocation of scarce resources, general versus partial equilibrium, micro versus macro economic theories, took a major step beyond mere "description of economic phenomena", even though this was a rather slow process.

The Indian scholars found it lamentable that while there had been interesting factual and historical studies, with "a little mixture of politics and policy formulations" up till 1960, economic theory as such remained a neglected branch of study in India. They accept that "in the remarkable intellectual effort which has resulted in the development of theoretical economics and the evaluation of new techniques of analysis, during the present century, our contribution has been insignificant".

Teaching of economics in Nepal was very much influenced by teaching of economics in India. There, the classes in economics had first started in 1923 with the introduction of the Bachelor of Arts Programme at the Tri-chandra College. The subject was taught according to the syllabus of Patna University (India). It was much later that the Institute of Humanities and Social Sciences set out that "the objectives of the courses at the bachelor's degree in economics are to familiarize in detail the students with important theories, and their use in the context of Nepalese economy".

In Sri Lanka, in the syllabus in economics offered by the Department of Economics of the then University of Ceylon (1942-1959) general economic theory was introduced, but the emphasis was placed on descriptive and applied economics and modern economic history. But "micro and macro economics which deserved great emphasis in any specialized course in economics were hardly referred to in this syllabus". Only in the post 1960 period the need to give greater weightage to economic theory was realized.

Some similarities may be observed in the course offerings in theoretical and applied economics in various institutes in Indonesia and Malaysia. In the Indonesian context, economics as a discipline covers a broader field than usually meant in the English speaking world. It includes in addition to economics proper, courses on business administration and management (which is also called "business economics"), accounting, and agricultural economics, for example. The faculty of economics consists of departments on the above-mentioned fields of specialization.

In Malaysia, the Faculty of Economics and Administration, in some universities, is sub-divided into seven divisions: Analytical Economics, Applied Economics, Rural Development, Accounting, Business Administration, Public Administration, and Statistics

The economists in the Republic of Korea discarded the pre-1950 emphasis on Marxian economics and engaged in the preparation and translation of textbooks on the principles of economics. The new economic theory, thus, began to influence the younger generation of economists in the 1960s and 1970s.

A serious attempt to spread the knowledge of economics in Thailand was initiated by Phya Suriyanuwat in as early as 1911. His book entitled "An Introduction to the Science of Wealth" explained classical value theory and provided examples drawn from the economy of Thailand. Other teachers continued and reinforced the trend.

C. Normative Economics and Economic Policy

In the early days of the development of the discipline, the role of so-called normative economics and economic policy was manifested in public finance, monetary and banking theory. The major concern of governments in those days was to raise necessary revenue to maintain normal functioning of the administrative machinery rather than initiate development programmes and projects. In the field of monetary economics and banking theory, again the priority concern was the maintenance of monetary equilibrium and to check inflation. With the advent of Keynesian economics in the West, the influence of which spread to the Asian region as well, the role of monetary and fiscal policies as instruments for stimulating investment, employment and economic growth came to be increasingly recognized. However, the Keynesian economics in the context of some non-monetized sectors of agrarian economies and mixed economies, where the private sector provided a narrow tax base, found limited scope for its application.

There has been a certain amount of discussion in India on the role of the economist as a policy adviser, but this discussion was devoid of any significant methodological content. Increasingly, however, Indian economists have seriously considered the framework of modern theory comprising policy variables and application of policy instruments.

Doubts were raised regarding the effectiveness of macroeconomic policy in developing countries like Indonesia by Indonesian as well as foreign economists. It was felt that the Government's monetary and finance policies in the last decade had shown the poverty of contributions by the country's economists. It had always been argued that "the strategic goal of the government economic policy was long-term institutional and structural development, and this could be more effectively achieved by law and regulation rather than conventional macro-economic policy which mainly focussed on short-term changes".

In contrast, the teaching of economic policy has become increasingly attractive in the Republic of Korea as she continued her sustained high growth during the two decades. Apart from the courses in economic planning and theory of economic development, the courses on government economic policies such as fiscal policy, monetary policy, agricultural policy and regional, environmental and resource policy became popular especially among senior students in Korean universities and colleges.

The Thai experience in this respect has been slightly different. The most striking characteristic of the content of economics courses is the emphasis of neo-classical and Keynesian economic theory and the historical approach to economic study. However, no attempt has been made to develop economic theories based on empirical research carried out in Thailand, despite the assertion that some economic theories were not relevant to Thailand. For example, Freidman's consumption functions theory explains income as consisting of interest on bonds and dividends on stocks. Tobin's theory of saving attempts to explain income in terms of investment in bonds and stocks. However, investment, which is an important part of both the theories, is an alien concept to Thai culture and does not appear to guide economic behaviour of the large masses of the Thai population.

D. Development Economics and Economic Planning

If one were to single out an aspect of the economics discipline which received utmost attention among economists and scholars in countries of the region, it would be Development Economics and Economic Planning. Development Economics had been accorded high priority simply because many countries in the region belong to the categories of developing and underdeveloped economies. Thus, a perusal of literature written by economists from India, Burma, Bangladesh, Nepal, Pakistan, Malaysia, the Philippines, Republic of Korea, Sri Lanka and Thailand will reveal major concern or contributions on the "Economics of Underdeveloped or Developing Countries" in general, and problems of poverty, stagnation and low productivity in particular, within specific national contexts. The economists and researchers viewed planning as a more powerful instrument of policy·to effect structural transformation of economies rather than intervention or regulation through monetary and fiscal policy measures. As a result, development planning occupies a prominent place in teaching and research in these countries.

The famous example in this respect is the work of Professor Mahalanobis of India, which essentially took the form of two-sector growth model. Recasting the planning models of the Indian economy (such as the Harrod-Domar model of the First Plan, the Mahalanobis model of the Second Plan, and the consistency and optimization models of the Third and Fourth Plan) in a policy framework, the Indian economists discussed in each case, the specified target in relation to the policy variables postulated in the model. The Fifth Plan approach, apart from the choice of model, specified clearly that "removal of poverty and attainment of economic self-reliance are the two major objectives".

A review of economic literature on the Nepalese Economy shows that the authors had all along been pre-occupied with finding ways and means for raising the standard of living of the people in the country, most of whom are poor. Thus the published works in economics were mainly related to the country's existing economic condition and planning strategies to alleviate poverty and to stimulate development of the various sectors of the economy.

In Sri Lanka, the National Planning Council and the Planning Secretariat were established in 1957, and a new Ministry of Planning and Economic Affairs was created in 1965. Among other divisions, this Ministry had a division of Plan Implementation. In 1973, a separate Ministry of Plan Implementation came into being.

In 1972, a new course consisting of some fifteen "job ranges" was started in the University of Colombo under a programme of "Development Studies". "Development Planning and Administration" was one of the major subjects associated with the Department of Economics.

The University Sains Malaysia in Penang opted for a multi-programme school system; here, the Economics and Development Studies Programmes were located in the School of Social Sciences (1970). The system was considered as more appropriate for the provision of inter-disciplinary education. Prominent among the subjects offered were, "Economic Development and Planning", "Development Studies", "Rural Development", and "Agricultural and Resource Economics".

During 1960, the recognition of the value of economics as a practical science began to emerge in the Republic of Korea. This trend had become very much intensified after the successful implementation of the First Five-Year Economic Development Plan (1962-1966). Economics was being regarded as a practical science that could contribute much to the development of the national economy. Many economists began to actively involve themselves in development planning by giving economic advice on monetary reform, agricultural policy, and other matters.

In Viet Nam, the Central Economy-Finance School was founded in 1955; the School was converted in 1958 into a University, i.e., the University of Economy and Planning. Obviously, planning was accorded high priority for socialist construction and development of the national economy of Viet Nam.

In Thailand, the National Institute of Development Administration (NIDA) was established with the purpose of training personnel in development administration at the graduate level for the civil service and business. Economics was also included in the graduate syllabus of NIDA. At the Thammasat University, "Economic Development" featured as one of the important subjects in the syllabi.

E. Labour Economics and Manpower Planning

The strategies and theories of economic growth and development have been much influenced by heavy emphasis on "investment" as a major parameter of the development process. While development problems and issues have been tackled from the angle based on capital output ratios in development planning exercises in many countries of the region, the role of labour productivity and human resource development as a growth strategy has not figured prominently in most planning theories and exercises. However, the role of manpower in the development process has gained increasing attention as reflected in curricula on labour economics and manpower planning in a number of countries.

Among the fifteen different thrust areas identified in the departments of economics in Indian universities are included Demography, and Economics of Education. Similarly, the economics curricula at the bachelor's level at the Institute of Humanities and Social Sciences, Tribhuvan University, Nepal, include "Human Resources" at the first year level and "Manpower Economics" at the second year level. Under the programme of "Development Studies" in some universities in Sri Lanka, "Population and Manpower" is a significant field of study. Similar observation may be made of the importance attached to "Labour Economics" in the economics curricula of universities in the Republic of Korea, and "Economics of Human Resources" in universities in Thailand. At the Economic and planning University in Viet Nam, among the faculties which covered fourteen specialized fields in 1983 was the Faculty of Labour Economics.

F. International Trade and Finance

The imbalances in the pattern of trade between producers of raw materials and suppliers of manufactured goods, against the background of colonization of a number of countries in the region, have long been recognized. However, the classical theory of international trade based on comparative advantages in the cost of production has tended to relegate the developing countries to remain in the status of raw material producers. The pattern of international trade and industrialization is naturally linked to problems of balance of payments, international banking, and finance. Thus, "International Trade", "Industrial Economics", "International Banking and Finance", came to constitute significant components in the economics curricula in the countries, in one form or another.

The Indian Universities teach courses on "International Economics", "Industrial Economics" and "Monetary Economics". In Nepal, apart from courses in "Industry" and "Banking", a course in "International Finance and Economic Integration" had been introduced. In Sri Lanka, teaching of the "Principles and Practice of Banking, Currency and International Trade", dates way back to early fifties. At the Seoul National University in the Republic of Korea, there are two parallel departments, namely, the Department of Economics and the Department of Trade, a clear indication of the importance attached to trade and related problems in international economics and international division of labour.

In the curricula of Thai universities, "International Economics", "Industrial Economics", and "Finance and Banking" have been given due recognition and importance. In the Economic and Planning University in Viet Nam two out of the nine faculties include "Industrial Economics" and "Banking".

II. Development of Infra-structures for Teaching and Research

Governments of most of the developing countries in Asia have given due recognition to the development of institutional infrastructure for teaching and research in economics.

In India, there are 46 university departments of economics. The ages of the departments range from 1 to 70 years. The average age is about 23 years, and the median age is about 18 years. Fifteen per cent of the departments are less than 5 years old.

In Indonesia, there are 26 faculties of economics in state universities in addition to the Agricultural University in Bogor which also offers degrees in agricultural economics, and Bandung Institute of Technology where courses cover some aspects of microeconomics and management in its related department of Industrial Engineering. In the private sector, there are hundreds of economics faculties and "academies" that typically offer economics-related subjects.

Another significant aspect of infra-structural development for economics teaching in Indonesia is external aid. To quote the author of the Indonesian paper: "a systematic institutional development (including organizational and curricular) in economics got its historical landmark in the fifties when the University of Indonesia signed a co-operative agreement with the University of Berkeley, for the period of 1956-1964; a similar co-operative arrangement was later made between Gadjah Mada University and the University of Wisconsin for the period of 1958-1964. Both agreements were funded by the Ford Foundation".

In the Philippines, as mentioned earlier, the role of private institutions is pronounced. The author of the Philippine paper surveyed the course offerings, research activities and faculty profile of 10 selected schools in the country. These institutions represent the best of the various school categories that exist in the country. Silliman University is the oldest and most prestigious Protestant School; Ateneo and De La Salle have preserved their lead position among Catholic institutions; the University of Santo Tomas, the oldest university in the country was founded under the Spanish rule in 1611. The University of the Philippines (U.P.) main campus is the recognized top university in a number of fields and it is the recognized economics graduate and research centre of the country. The U.P. Los Banos campus was established in 1908 as the agricultural branch of U.P. in Manila. It is now an autonomous part of the University of the Philippines System. Xavier in Mindanao and Ateneo de Naga in Southern Luzon are two highly regarded Jesuit provincial universities.

In Malaysia, higher education is provided by five universities. Among these Universiti Malaya (U.M.), Universiti Kebangsaan Malaysia (U.K.M.), and Universiti Sains Malaysia (U.S.M.) offer major programmes in economics. All the universities have an identical administrative system.

According to the *Hankuk Hakkyo Myungham* 1982-83 (Directory of Schools in Korea 1982-83), there were 478 members of teaching staff working both at the department of economics and the department of trade in Korean universities and colleges in 1981. Of the 378 members of the teaching staff, 364 were employed by the *Daihakhyo* (universities) and the rest by *Daihak* (colleges) and *Junmoondaihak* (junior colleges).

In Thailand, courses of study at the university level are offered at six state universities: Thammasat, Chulalongkorn, Kasetsart, Chiangmai, Ramkhamhaeng, and Sukhothai Thammathirat. The National Institute of Development Administration (NIDA) also has a graduate programme in development economics. Just recently, three private colleges, the Commerce College, the College of Business Administration, and Krik College were permitted to grant degrees with a specialization in economics.

In Sri Lanka, under the Universities Act No. 16 of 1978 a University Grants Commission (U.G.C.) was established and University status was consolidated at six campuses. Thus six universities, namely, those of Peradeniya, Colombo, Jaffna, Kelaniya, Sri Jayawardhanapura, and Katubedda came into being. In 1979, the Ruhunu University College in the South under a Director, and the Dumbara Campus affiliated to the University of Peradeniya were established.

Two years later was born the Batticaloa University College in the East Coast of Sri Lanka. All these institutions of higher studies, except at Katubedda University and the Batticaloa University College, were Arts dominated while the leading subject with the Arts in all the institutions was economics.

In Viet Nam, the first important event in terms of infra-structural development was the founding of the Central Economy-Finance School in 1955; the School was converted in 1958 into a university, i.e. the University of Economy and Planning. Following the establishment of the University, a number of other colleges and middle schools were founded with specializations in specific branches of studies in economics.

The infra-structural development for research in economics took different forms in various countries. In most cases research work was associated with universities and institutions of higher learning. In some cases, specialized research institutes/centres were established. Serious attention has been directed, in most cases, towards development of research projects, particularly applied research designed to promote socio-economic development of the countries.

In India, economic research became the key concern of social science research institutions outside of the University system. At present, there are eighteen such research institutes. Out of these, five have a major focus on economics and in another three also economics or applied areas related to it are an important component. The research institutes with major focus on economics include the Centre for Development Studies, Trivandrum; Giri Institute of Development Studies, Lucknow; Institute of Economic Growth, Delhi; Madras Institute of Development Studies, Madras; and Sardar Patel Institute of Economic and Social Research, Ahmedabad. The research institutes with economics as an important component include the A.N. Sinha Institute of Social Studies, Patna; Centre for Studies in Social Sciences, Calcutta; Institute for Social and Economic Change, Bangalore.

In Nepal, research in economics is carried out mainly by the research units of Tribhuvan University and by private agencies. The Centre for Economic Development and Administration (CEDA) has the largest number of staff with economics background among the university research units. The other units include the Research Division and the Institute of Humanities and Social Sciences (IHSS). Research institutes outside the University include the Agricultural Projects Services Centre (APROSC), Nepal Rashtra Bank (Central Bank), New Era, Integrated Development System, and National Research Associates. There are about a dozen more newly established private agencies which employ full-time staff trained in economics.

In Sri Lanka, university teachers in all departments of economics could hardly engage themselves in research due to heavy teaching load. The funds available for research are very much limited. Nevertheless, there is a fair amount of on-going research funded by foreign agencies like the ILO, Konrad Adeneur Foundation, the University of Oslo, and ESCAP. Despite the numerous constraints, the universities are able to publish quite a few journals incorporating the research output of university researchers in economics. In addition, the Research Division of the People's Bank, established in November 1974, conducts both short-term research which is concerned with the analysis of specific bank credit programmes, and long-term research on priority areas in terms of national economic development.

III. Trends in Economic Research

A review of literature, study projects, reports, and publications would indicate that trends in economic research in Asia are closely linked with concerns for economic growth and development, methods and techniques of development planning, sectoral analysis, structural transformation and related external economic relationships. In the earlier stages of the development of the discipline, research emphasis was laid mostly on "primary production" i.e. agriculture, forestry, fishing, livestock etc. As increasing attempts were made to transform the economic structures, research on industrialization, infra-structural development, service sectors, trade and finance became more pronounced. Research on technology and related human resource development, particularly labour productivity and unemployment could be traced in a number of instances. Obviously, research on economic growth, development planning, and related methodology can be seen as a broad and continuing endeavour. Recently, some attention has been directed towards income distribution and welfare aspects in some countries.

In India, research studies have covered a wide spectrum of issues including inter-linkage between population-related factors and socio-economic variables; relationship between poverty and unemployment; econometric plan modelling; regional differentiation in Indian agriculture; capital intensity and industrial development; terms of trade and agrarian economy; determinants of savings in Indian economy; socio-economic systems as related with the use of non-renewable energy sources; quality of human capital, just to mention a few.

Research activities in Nepal may be classified as "Academic Research", "Policy Research", and "Feasibility and Evaluation Studies". Doctoral dissertations written by Tribhuvan University students are examples of academic research. A few titles of such dissertations are worth mentioning e.g. Role of Agricultural Taxation in Nepal's Economic Development; Population Dynamics in Nepal; Regional Planning with Special Reference to Nepal; Industrialization in Nepal: Import Substitution or Export Promotion Industries. Policy research and Feasibility and Evaluation Studies form a major area where both the university and outside agencies are involved.

The author of Sri Lanka paper observes that "the economic literature on the British period of Ceylon History (1798-1948) though voluminous, focusses itself on some selected aspects of plantation agriculture. Certain sectors of the economy such as foreign trade and rural agriculture received scant attention of writers .... The period following independence (1948) introduced marked change in the economic writings on Sri Lanka. Not only was there a substantial volume of articles, monographs, etc., written by trained economists -- both local and foreign -- but the coverage was diverse. Because of the new thrust on economic development of the country, policy oriented or action oriented research received greater emphasis.

In Indonesia, 168 articles in *Prisma* published during 1976 to 1982 dealt with economic problems and general issues concerning socio-political aspects of the Indonesian economic system, strategy of national economic development, problems of poverty and social justice, urban and rural dichotomy, food, nutrition, demography and employment, north-south dialogue, energy etc. Other research studies and publications in journals were related to social structural aspects of rural communities; government policy on rural development; agro-economic survey; quantitative macro-economic planning models etc.

A list of research projects carried out by economists in Malaysia during 1979-81 covers a wide spectrum classified under analytical economics/economic analysis and public policy; applied economics/economic development and planning/development studies; rural development/agricultural and resource economics; accounting; business administration; public administration; statistics/economic statistics etc. A wide range of issues relating to economic growth and planning and development administration are dealt with.

The author of the Philippine paper gives an account of economic studies undertaken in the Philippines in the post-war period and makes the following observations. First, there is an unevenness in the level of activity among the fields. Secondly, different areas of research interest developed at different time. Studies on growth and industrialization had the earliest start in the 1960s, demography in the late 1970s, income distribution and poverty in the mid-1970s, and spatial economics at the turn of the 1980s. The more traditional fields like public finance and monetary economics are starting to receive greater attention which hitherto remained somewhat neglected. Studies in international trade are almost wholly done by one single scholar. There is some interest in the current popular issue of multi-national companies.

The earlier research work in the Republic of Korea was concentrated on the translation of foreign books and materials particularly from Japanese and English. The publications between 1879-1979 were classified into 10 broad categories. During the period between the end of the second world war in 1945 and the Korean War in 1950, for example, there were 64 books and 419 articles published, and 58 foreign publications translated. Upon entering the 1960s, two important factors began to influence the economics profession in general and the economic research in particular in that country. One factor is that the Republic of Korea, by adopting on outward-looking development policy and using the five year development plan as its major development tool, began to develop fast. The other factor was that new breed of economists who had been trained in the United States, or Europe, began to return to the country to teach and, to join the government as major policy makers. The academic interest of the economics profession in the Republic of Korea has increasingly become diversified during the 1960s and 1970s and research increasingly related to the real economic problems of the day. For example, majority writings on international economics are concerned either with trading relationship or foreign capital and very few on pure theory of international economics. The writings also show the increasing awareness of the Korean economists about the fact that the Korean economy relied more on the export market than on the domestic market, and on foreign savings than on domestic savings.

In the Republic of Korea, there are several autonomous research institutes, both public and private, that are devoted to economic research. The more important ones would be the Korea Development Institute, Korea Institute for Industrial Economics and Technology, Korea Rural Economics Institute, Korea Physical Planning Institute, Korea Economic Research Institute, Institute for Asian Economics, Korean Industrial Development Institute, and Korean Economic Research Centre.

For a long time, the University of the Philippines School of Economics (UPSE) was almost the sole producer of research in the Philippines. In the last ten years, a few research units or institutes have been established by the government. The more active of these are the Institute of Labour and Manpower Studies (ILMS), the Technical Board for Agricultural Credit (TBAC), and the Philippine Institute for Development Studies (PIDS).

In Malaysia, the Centre for Policy Research is an autonomous research institute established in 1971 at University Sains Malaysia (U.S.M.). It undertakes research projects which are mainly government-sponsored, and require full-time commitment by staff and involve large scale employment of project personnel.

The responsibility of universities to conduct and promote research is recognized in Malaysia as vital. The budgetary requirements are predominantly fulfilled by centralized research funds and administered and supported by the respective universities. Nevertheless, because of increasing competition for these funds, researchers also solicit and receive grants from outside agencies -- national (government or otherwise), or international, such as International Development Research Centre (Canada), Institute of Developing Economies (Japan), and various United Nations organizations, such as ESCAP, ILO, UNFPA, and Unesco.

Economic research in Thailand is considered to be at an "embryonic" stage or a post 1960 endeavour. Apart from the research activities and projects undertaken by various universities, social science research in Thailand received an important impetus from the founding of the National Research Council of Thailand (NRCT) in 1959. The Council has played a significant role in the promotion of research activities.

The main institutes engaged in comprehensive economic research in the Socialist Republic of Viet Nam are the Institute of Economic Management Research of the Party's Central Committee and the Council of Ministers, the Institute of Economics and the Institute of World Economy of Viet Nam Social Sciences Committee. Scientific research in general, and economic research in particular, is guided by the socio-economic objectives defined for the country's development.

IV. Problems Associated with the Development of the Profession

A number of problems have been identified by the authors of country reports with respect to the development of the economics profession ranging from curriculum and translation of literature into national languages; dependence of students almost exclusively on the teacher who resorts invariably to the dictation of notes; staff recruitment, retention, qualifications; adverse teacher-pupil ratios; inter-institutional disparities; graduate unemployment; meagre resources for research; utilization of research findings etc.

We are told that "the basic problem of the proefession of economics in India is the dualism that underlies its development both in teaching and research. There are institutions which are well endowed and compare well even on an international scale. Yet there are substantial problems of development for a large number of institutions outside the elite institutions. Well qualified economists generally get employed very quickly. Studies, however, have shown that the waiting period for a post-graduate in economics from an average Indian university can extend up to 24 months. At the under-graduate level teaching has switched over to the regional languages in many universities. The translation of materials into the regional languages is adequate in those states which have a large clientele. However, special efforts need to be made for strengthening translation of material in such languages and also translation of selected journal articles".

The author of the country report on Nepal enlisted the following problems associated with the development of the economics profession in Nepal: (i) research endeavours relating to theoretical concepts are generally lacking in Nepal; (ii) interaction between teaching and research is practically absent; (iii) lack of incentives for faculty members to undertake research; (iv) lack of time for faculty members to undertake research; (v) a general shortage of research manpower at Tribhuvan University, private campuses, and in research agencies; (vi) increasingly bleaker job prospect for economics graduates; (vii) lack of demand for utilization of the research conducted etc.

It was reported that in Sri Lanka from 1960 onwards the universities were confronted with the progressive decline in academic standards. The switch-over to national languages as the media of instructions in economics created the problem of lack of competent teachers qualified both in the national languages as well as in English. One of the alleged causes for the declining academic standards had been the inability of the students to read texts in English. The increase in the student enrolment for courses in economics in the universities has adversely affected the teacher-pupil ratios. The more distressing feature was the presence of a fewer number of experienced teachers of economics in all the campuses. The problem of personnel is a major constraint in Sri Lanka not only for the development of research institutions for economics but also for the continuance of on-going research. There is paucity of funds for the publication of research monographs as well as the publication of regular professional journals.

Well-trained economists in Indonesia are still relatively few. Almost all of them are returnees from graduate studies abroad, mostly from the United States. Those who are working in academic institutions are clustered in a few universities, especially at the University of Indonesia and Gadjah Mada University. Because of low salary of civil servants and uncertainty of research funding either through the university budget or commissioned research, most faculty members spend more time teaching outside their own institution for additional income. This leaves them with little time to concentrate on research. There have been attempts to write economics textbooks in the last five years. Earlier economics textbooks, published in the sixties, were translations of standard English or Dutch economics textbooks. Nowadays Indonesian economics textbooks use Indonesian economic data for illustration. The policy to produce generalists with limited specialization has been responsible for the lack of good quality professional economists. More exercises and laboratory work on empirical data need to be promoted. Professionalization is emphasized more in the business sector, including in government banks. Arrangements have been made with the University of Indonesia and the Gadjah Mada University to conduct special training courses in banking management for new recruits of a State Commercial Bank. Serious question has been raised on the value of economics graduates to deal with traditional sector of the economy and also in co-operative organizations. There is a general impression that Economics education is relevant to the modern sectors of the economy. While ideologically co-operative organization is supposed to be a hallmark of the Indonesian economic system, formal training in this area receives only marginal attention.

In Malaysia, in spite of the recent adjustments in the gross salaries of academics to the rising cost of living by payment of allowances, low financial returns and poor promotion prospects are two of the common disappointments in the universities. When income is insufficient, some academics are required to supplement their university salaries by spending more time on outside work. When undertaken excessively, such work becomes detrimental to university work. The pressure of time arises from work including teaching and commitments such as administrative work and marking of examination scripts. This problem is particularly felt by those staff members who need time badly for their research and study in order to attain advanced degrees. Other than a few links with government-run institutes, the available research talent within the academic community is hardly tapped by the private sector.

The author of the country report on the Philippines cited from Ateneo de Manila, the financial problems faced by private institutions, particularly "low faculty salaries, lack of opportunities for professional advancement outside the classroom, inadequate funding of faculty development programmes, poor library and research facilities". Teaching load is generally heavy in private schools and institutions, obviously leaving little time for research and professional development. Recently, there was some discussion about possible state support for private universities. The idea has not as yet reached the planning stage and it is not likely to be seriously considered by policy makers given the backward condition of the economy and the budgetary constraints. The dearth of theoretical studies in the Philippines poses a serious problem in the economic thinking in the country; the theoretical basis of practically all empirical and policy analyses done in the country has its origin in the most economically advanced Western societies, particularly the United States. It is necessary to take into account the fact that economic decisions and behaviour are influenced by the economic, social, political and cultural environment in which various forces operate.

The crisis in higher education in Thailand has its roots in the tremendous growth in numbers of secondary school graduates in the past decade. To try to maintain high academic standards with the constraints and growing demands for higher education, universities will have to search for programmes to bring about improvement in management, teaching-learning processes, and staff development programme. This applies to teaching of economics as well. Since research on economics of Thailand is still in its formative stage, not much of it enters into curricula.

In Viet Nam, while all disciplines needed for the development of economy as well as the development of economic sciences themselves exist in the system of higher education there is still a need to improve the quality of training in theory and practice. To broaden the training of experts in various branches of the economic sciences there are immediate needs as regards infra-structure. What is more important, however, is the training of teachers themselves.

V. Summing up

The survey has reflected the needs and priorities for further development of the economics discipline, strengthening of the infrastructure for research as well as intensification of research activities in countries of the region. The agenda for the future vary from country to country including: indegenization of the discipline in the social-cultural context and resource endowment of specific countries; strengthening the role of economic research in policy decision-making and development; development and application of econometric methods and modelling; strengthening of infrastructure for economic research; intensification of research in specific sector or sub-sectors; promoting incentives and motivation of academicians and researchers; provision of adequate funds for research; increased access to international publications and journals; improvement of documentation/translation facilities; staff development and training; improvement of the prospect for employment of graduates in economics; facilities for post-graduate studies and research etc.

The basic problem in India, as noted earlier, is the dualism that underlies its development both in teaching and research. Disparity both in academic standard and endowment between the "elite" institutions and the rest hampers the advancement of the discipline as a whole. The need is basically to integrate on a larger scale the training of a vast majority of Indians qualified in economics with the development that takes place in the best part of the profession.

At the under-graduate level teaching has switched over to the regional languages in many universities. Special efforts need to be made for strengthening translation of materials in such languages and also translation of selected journal articles. Efforts for the upgrading of curricula are already under way and need to be strengthened.

The plan of action in Nepal also aims for meeting the requirements in teaching, research and application as well in meeting the country's needs for policy relevant research. It includes specifically orientation toward quantitative analysis and enhancement of skills in handling data; promotion of increased student participation in classroom discussions; encouragement of interaction between teaching and research; consolidation of applied research and creation of favourable environment for theoretical research; provision of incentives and facilities for faculty members to write textbooks, and undertake theoretical as well as applied research; stimulation of existing professional organizations as well as establishment of additional professional organizations; orientation of research endeavours towards the major economic policies of the government's five-year economic development plans.

For Sri Lanka, similar measures are suggested for improvement of teaching and research in economics. These include specifically, urgent arresting of the decline in standards of teaching both at school and the university levels; encouragement of scholars and faculty members to write texts and translate standard texts and research papers into national languages; organization of a programme of continuing education by way of frequent refresher courses, seminars etc.; promotion of a post-graduate Institute of Economics or an Institute of Asian Development Studies; possibility of founding a National Economic Research Council; establishment of an efficient communication strategy and an expeditious system of publishing the research findings; encouragement of policy-oriented or action-oriented research requiring a multi-disciplinary approach; development of a forum for professional contacts and inter-change of ideas, views and experiences.

For Indonesia, it was suggested that "the critical strategic step should be the enhancement of national capability to produce home-grown well-trained economists with better quality". Specific measures includes improvement of financial incentive structure to achieve some acceptable time commitment from senior staff for research; improvement of academic environment like working space, library etc.; introduction of more elective courses to provide a solid basis for better specialization; promotion of the system of "contract research" to provide better answers to policy issues; promotion of textbook writing with concessional income tax rebate; promotion of proficiency in foreign languages to facilitate access to international literature and research findings etc.

In the Philippines, the suggested measures have focussed particularly on faculty development, incentives, and motivation. Specially these include encouragement of post-graduate studies; recruitment of well-trained economics faculty particularly in private institutions; reduction in heavy teaching workload of faculty members; promotion of theoretical as well as empirical research for policy analysis etc.

In Malaysia, economics is considered still a younger discipline and most of teaching is done at the under-graduate level. Because of lack of trained manpower not much research has been carried out by indigenous scholarship. A wide virgin territory of economic research and challenging opportunities are recognized in terms of possibilities to contribute to national development efforts and programmes.

For the Republic of Korea, the suggested measures for further promoting and strengthening the economics discipline and profession include activation of professional associations through organization of frequent professional meetings; establishing closer co-operation between the academic institutions and the government-funded research institutes; provision of more incentives for researchers; establishing closer link and co-operation between universities and the government; upgrading the international competitiveness of Korea's economics profession.

Economics teaching in Thailand also has a relatively short history. The need for improvement is required in terms both of the under-graduate and graduate programmes; preparation of textbooks; development of specialists in mathematical modelling and applied research on Thai economy.

In Viet Nam, the need is recognized to enhance the number of Vietnamese economists and to improve their quality by exposing them to recent advances in economics. Specific measures include improvement in communication of advances in the economics sciences; combining theory and practice; international co-operation for further advancement of the discipline etc.

The review of the present status of teaching and research in Asia attempted here indicates that action is needed both at the national and regional level to promote economic science orientation, and to develop cadres of indigenous economists to contribute their expertise in solving economic problems that confront the region and in ensuring desirable development of economics and societies.

Culling out from the various country reviews the suggestions offered to enhance the visibility and utility of the scientific discipline of economics, one can indicate the following agenda for the future. This agenda is divided into three sections: (i) actions in regard to teaching; (ii) actions in regard to research; and (iii) growth of the profession in general.

(i) Actions in Regard to Teaching

In this area, following appear to deserve priority attention:

(a) *Faculty Development*

Many countries suffer from the lack of adequate and well-trained manpower. The advances made in the discipline are so rapid that many of the teachers are finding it difficult to cope with them. Increasing quantification, and use of electronic data processing techniques in economics have necessitated training of the teaching staff in these techniques. The situation is precarious in the colleges where the faculty's major pre-occupation is teaching, and that too at the under-graduate level. Because of their own training inadequacies, courses are not updated and new advances in the discipline not incorporated in the curricula. Heavy teaching load is yet another constraint that prevents the college teachers from engaging in research, or further training themselves in recent advances.

(b) *Curriculum Development*

Associated with faculty development is the problem of curriculum development so that the courses reflect recent advances in the discipline, and incorporate results of research carried out within the country and the region which have greater relevance than esoteric theories or research findings related to developed economies.

Action is also indicated for the introduction of post-graduate teaching in economics in the countries, or the universities where it does not exist. This would also entail introduction of specialized courses in different branches of economics.

(c) *Textbook Development*

Changes in curricula would require preparation of appropriate textbooks that would include new topics, and illustrative content drawn from the empirical researches conducted within the country and the region. Such textbooks will also have to be prepared in the national languages of the different countries as the medium of instruction is being shifted from international language to the national/regional language even at the post-graduate level.

The programme of textbooks development will have to go alongside of translation into national languages of the representative works published in major international languages so that the new generation of economists from these countries does not remain ignorant of the recent advances.

Care will also have to be taken to ensure that students develop some proficiency (at least reading ability) in one of the foreign languages, so that they do not have to depend upon the translations; for, translations will increase the knowledge gap due to time lost between publication of an article and its translation (and publication of the translated version), and also due to distortions that may creep in through translation.

(d) *Infra-structural Development*

To improve teaching, it will be necessary to equip the teaching departments with good library and adequate laboratory facilities -- calculators, computers and the like. Audio-visual devices in teaching will be a great help.

(ii) Actions in Regard to Research

In many countries, which have a relatively short history of economics, indigenous scholarship has paid scant attention to research. Country's top economists, mostly trained abroad, are in short supply and are involved in planning and policy making activities with little time left for research. Others are engaged in teaching with a heavy workload. Thus a climate of research needs to be created if both relevant research, and research by indigenous scholars, is to be encouraged.

This would require research manpower development, provision of adequate funding for research, good incentives (honoraria, recognition) for doing research, and a policy of the government setting out priority areas for research. Both theoretical and applied research need to be promoted and inter-disciplinary orientation ought to be encouraged. For doing this, efforts may be needed to create special research cells, to set up funding agencies, and to develop a programme of publication of research findings.

(iii) *Professional Growth*

While economics is a discipline that has the advantage of an early arrival compared to other social sciences in the region, it is still in its infancy in many countries where it is taught only at the under-graduate level. Thus, students have to go abroad for higher education, and that too to the countries outside of the region despite the fact that such training can be imparted in some of the well-established departments of economics in some countries of the region. Countries where economics manpower is limited are continually dependent on outside consultancies both in the area of research and governmental planning and management of economic affairs. The situation can be changed only when there is general academic improvement and introduction of higher level of teaching in the universities and colleges.

It is only through this means that the "call for indigenization" of economics can be met.

There is an acute need to establish interface between teaching and research, betwen so-called "elite" institutions and "peripheral" centres of learning, and between academicians and policy makers and planners.

To create such interfaces, professional associations need to be strengthened and mechanisms be developed to disseminate the findings of research through publication of journals and research monographs, and organization of conferences and symposia.

There is also a need to encourage both regional and international exchange of scholars, and of information. Creation of social science information and documentation centres at the national level, and establishment of a regional network of such centres will be a right step in that direction.

TWO

INDIA: *Yoginder K. Alagh*

I. History of Economics and of its Institutional Development

There is considerable literature on treatises written in acient India on economics. Kautilya's *Artha Shastra*, and Manu's *Dharma Shastra* are the texts frequently referred to, although other texts are also discussed, for example, Shukra's *Varta Shastra*. The main emphasis in these treatises was three-fold. There was an element of description of the then prevailing economic system. The emphasis was, however, not on analytical description of structure, or of the functioning or interaction of various economic processes at play, but was on classificatory and taxonomic descriptions of the socio-economic reality as perceived by the author. The second emphasis was on the preparation of rules of bureaucratic control and of the functioning of the State apparatus in relation to the economy. There was little of economic analysis or speculative thinking, and a greater concern for the formulation of the rules of bureaucratic control to be laid down for manuals to be followed by the rulers. However, the role of the king and all his machinery in relation to the creation and augmentation of the kingdom's wealth, as also the need for non-arbitrary behaviour in this connection was emphasised. The cost of top-heavy administrative structure was not foreseen. Third, there was an emphasis on the prescriptive and moral aspects of economic behaviour which was related to religious thinking and rules.

In the context described above, the role of public services, economic regulation, price support, public finance, and the economic organisation of the administrative structure was fully detailed. However, to quote Spengler, "there was a very small amount of feedback between the world of economic reality and the world of the mind reflected in the shastra literature. This lack of feedback is traceable immediately, of course, to the prescriptive approach of the authors of this literature and their lack of interest in fashioning a system of economic analysis, a super-structure in terms of which their individual rules might have taken on theoretical implications. Presumably, the rules laid down had at one time a rational basis and sufficient compatibility with the world of economic reality to conduce to politico-economic stability. Moreover, a degree of flexibility had been built into the rules. It was hardly enough, however, to match the variability of conditions within a comparatively static society or to give scope to improvement of the rules. Undoubtedly, therefore, detailed economic inquiry would reveal considerable variation over time in the degree to which actual inter-personal economic relations corresponded to those laid down. This variation, in turn, might have led to economic analysis of sorts, as it did in the post-medieval Western world, but it did not do so" (Spengler, 1971:105). Spengler further notes:

> The non-analytical orientation of the Hindu system of thought reduced its capacity to facilitate economic development. For, this system was essentially taxonomic and prescriptive in character and concerned with laying down empirical rules calculated, on the basis of previous experience, to produce concrete economic and political results; it was not an engine of analysis given to inquiry into the genesis, foundation and adequacy of these rules. It seems to have been implicitly assumed that mundane society was static and hence unlikely to benefit from important changes in rules which were sanctioned by their antiquity and Hindu society's long experience with them. Hence, the rules were repeated from generation to generation and the economic foundations and implications of many of these rules tended to be disregarded (Ibid, 125-126).

With the establishment of two more universities in 1882 and 1887 in addition to three established in 1857, the opportunity to study economics in the modern sense of the term, increased in India. Political economy was a required or an optional course. The number of colleges also increased to 27 in 1857, 72 in 1882, and 191 in 1902. Commerce education began in 1886 which included strong doses of economics.

Increasing interest in political economy, together with greater use of it and increase in the number of economists, gave rise to Jevon's discussion of economic development, a subject of concern to Indian economists, and to a large literature on the content and teaching of economics in the educational curriculum, the subject still being a hot favourite. There was complaint that too little use was made of Indian economists on commissions of economic inquiry and policy making. Also Indian universities had too little equipment, and that economic research received little support.

1. The Development of Indian Economics

In nineteenth century India, it was the concerned for the acceleration of the independence movement that stimulated interest in economics. India's economic writers, therefore, found in economics an ideological tool and means to problem solution rather than an analytical apparatus, which it finally became after World War II. Bhabhatosh Datta classified the growth of economics in two periods: the nationalist period ending with the outbreak of World War II, and analytical economics taking over since (Datta, 1962).

Ram Mohan Roy (1772-1833), "Father of Modern India", was critical of the feudal land owning systems under which the cultivators were miserable and a few big land-holders enjoyed comforts. The share of the *Zamindari* had frequently become excessive (often one-half or more of the gross produce), and the value of the *Zamindar's* (feudal lord) property had risen 10 to 20 times. He pleaded for the reduction of rent of cultivators, and limitation of landholdings by the Zamindars. He was also critical of the salt monopoly, favoured tax on luxuries if necessary to offset a decline in land revenue, and advocated cutting the cost of government by substituting native for European civil servants, and militia for the army. He stressed the importance of private property and a prosperous middle class, while asserting that the government must protect its relatively helpless citizens. Mahadev Govind Ranade (1842-1901), graduate of Bombay University, concerned himself with Indian economic development and gave shape to, what was called, "Indian economics". Under this system, the student, after doing or reading for a course in the principles of economics, studied "Indian economics" as a separate subject, often from a geographic point of view and usually under the assumption that "peculiar unities" - laws or problems - underlay the Indian economy. This approach became popular and many books bearing the title "Indian Economics" appeared and continue still. Many were, and are, of indifferent quality consisting of unstated value premises, some often replete with unconnected statistics and full with long quotations from official documents, and stuffed with a multitude of "definitions" of key concepts, given in foreign text books. Significant exceptions are, of course, there. Swamped as they were by India's poverty, economists were long concerned mainly with practical issues. The Indian National Congress Party, political instrument of the rising middle class, also led to this emphasis and such literature increased in the later nineteenth and early twentieth century. Economic matters were the subject of about one-sixth of the articles appearing in 1897-1913 in the Journal, Dawn, originally "a vehicle of higher Eastern and Western culture" and later an organ of Indian nationalism. Practical subjects predominated in the *Indian Journal of Economics* -- India's first professional economic journal established in 1916. Dadabhai Nauroji (1825-1917), the Grand Old Man of India, laid the foundation for an "Indian Economics", which placed on Britain the major responsibility for the miserable state of India's population. Dadabhai is best known for his development of the "Drain Theory", which analysed the impact upon the Indian economy of the unilateral transfer of funds from India to England. According to the Drain Theory, first elaborated in the early 1870s in connection with Dadabhai's study of poverty in India, the failure of the Indian economy to provide the people of India with an adequate subsistence was traceable to the drain of capital out of India and resulting in the depression of her productive capacity (see description in Dantwala, 1973). Dadabhai supported the self-reliance movement, though he believed that under free and natural conditions, trade would be advantageous to both countries. Dadabhai's contribution consisted in his construction of an anti-imperialist argument that won wide support and strengthened the ideology on which the independence movement rested. His estimates of India's income and of poverty manifested a grasp of quantitative economic relations (gross output of Rs.20 per head per annum around 1870).

Dadabhai's main theses found support in the writings of Romesh C. Dutt (1848-1909), Congress President in 1908, economic and social historian, litterateur and member of the Indian Civil Service (1869-97). Though critical of British rule, he recognised Britain's contributions to India The Indian economy had been subject to a continuous unrequited drain which had arrested its development and that of agriculture in particular and thereby prevented significant improvement in average income. India was subject to frequent famine, mainly because of the chronic poverty of cultivators. Accordingly, he argued, governmental expenditure, together with the excessive tax burden incident upon agriculture, would have to be greatly reduced and agriculture itself, the principal industry, would have to be modernised and made more productive, in part by giving cultivators greater incentive through reduction of rent and better organisation of marketing and rural credit. Industrial development was indicated to absorb excess labour in agriculture, to offset the decay of indigenous industry and shift of its work force to agriculture, and to facilitate the reorganisation of agriculture and the conditions under which it was carried on.

On the authors of Nauroji's generation there was greater impact of economic development theorists rather than that of neoclassical equilibrium analysis. The source of ideas was the economic theories of the state going back to Hamilton, List and others, rather than, Smith, Mills, and Marshall.

In the last third of the nineteenth century, industrialisation, state intervention and protection (sometimes in the form of *Swadeshi*) had the support of a number of writers who were more concerned with political than with economic issues. Support for laissez-faire was uncommon. While the character of economics and the behaviour of economists changed after World War I, with the introduction of specialised degree courses in economics at Calcutta (in 1909) and other universities, one legacy of economic nationalism persisted, namely, belief in the necessity of considerable socialisation and the transformation of the exploitative economic structure introduced into India by its alien rulers. There was perhaps also the legacy of the Indian economy out of keeping with Mahatma Gandhi's emphasis upon the spiritual aspects of economic life and a philosophy of the isolated individual or of a small group, peasant or artisan, not of the industrial masses.

While provision was made in and after 1909 in some universities for a degree in economics, it may be said that before World War I, "Indian Economics" dominated Indian economic thinking. This entailed emphasis upon description and particularities, together with rejection of a general theoretical approach. It also came to involve considerable dependence upon the state as a fomenter of economic development, though without the assistance of models now so fundamental to Indian economic planning.

2. Contemporary Influence: The Colonial Heritage

The impact of the colonial period on the recent Indian economy is generally recognised in serious economic literature. Two facts bring this out: the narrow locational bases of modern industry in the colonial period, and the disastrous impact of colonial policies on the availability of food grains. These are illustrated below.

D.R. Gadgil (1954), D.H. Buchanan (1966), W. Malenbaum (1962) and Daniel and Alice Thorner (1967) have outlined the salient features of the Indian economy in the nineteenth century which opened up to the forces of international trade, and witnessed simultaneous opening of internal transport arteries, expansion of primary production and the subsequent development of raw material based on industries such as cotton textiles and plantations. These descriptive studies pin-point the narrow locational base of each industry primarily around port towns and the raw material supply centres (Buchanan, 1966, Chs. 6 and 10-13). J. Bhagwati and Padma Desai sum up the historical record of industrialisation by the statement that:

> Indeed it is dubious whether despite the undoubted growth and diversification (however limited) of enterprise and industrial investment through the nineteenth century and the indisputable prosperity of burgeoning centres such as Bombay and Calcutta, the overall impact on the Indian economy was not any-

> thing more than perfunctory (Bhagwati and Desai, 1970:31-32).

The industrial expansion due to the impact of the World Wars and tariff protection, particularly on industries like cotton textiles and iron and steel, cement, paper and sugar is well-known. However, the following quotation from the first Census of Manufacturing Industry adequately sums up the situation before independence:

> The three major provinces (West Bengal, Madras and Bombay) accounted for 68% of the total factory strength. Rice mills accounted for 31% of the factories, general engineering for 21% and vegetable oil mills for 11%. These three industries accounted for 63% of the factories in the 29 industries (Bhagwati and Desai, 1970:31-32).

General engineering factories accounted for 7.25% of the aggregate industrial employment in 1946 while the proportion was 3.19% in 1929. Many of the general engineering "factories" were in fact repair shops. Malenbaum comments that:

> after allowing for the expansion in services, facilities, and in coal output needed for the railway system, there was little evidence of industrial diversification. While each large textile factory was soon surrounded by a large number of machine repair shops, these remained small scale makeshift enterprises and again nor did the advent of steel give rise to modern machine building industry (Malenbaum, 1962:153-154).

In the first half of this century of colonial rule in India there was a dramatic fall in the per capita availability of foodgrains which went down from 200 kgs. in the quinquennium ending 1905-1906 to 132.2 kgs. per year in the quinquennium for the year ending 1946 (Table 1).

3. Indian vs. Universal Economics

There has been debate on the need for "Indian economics" as contrasted with the universality of the application of economics as a science, irrespective of historical and space specificity. In December, 1960, A.K. Dasgupta lamented that while there had been interesting factual and historical studies, with "a little mixture of politics and policy formulations", economic theory as such remained a neglected branch of study in India (Dasgupta, 1961). Given the "traditionally speculative" nature of the Indian mind he found this neglect surprising. While pointing out that the provocation for theorisation existed in the dual nature of the

TABLE 1

Per Capita Availability of Foodgrains
1901-1946

Period	Per Capita Availability	
	Kgs. per year	Grams per day
Quinquennium ending		
1905-06	200.2	549
1910-11	198.4	543
1915-16	191.9	525
1920-21	195.1	534
1925-26	200.2	549
1930-31	179.9	493
1935-36	170.7	467
1940-41	158.6	434
1945-46	152.2	417

(Source: Government of India, Ministry of Agriculture and Irrigation, *Report of the N.C.A.*, Vol. 1, Delhi, Manager Publications, 1976:207).

Indian economy and problems of stagnation and primitive accumulation, Dasgupta's appeal was for the discovery of "forces that are persistent and general" following from his dictum that "science is not to be parochial either in respect of space or in respect of time" (Dasgupta, 1961:208). Three years later, V.R. Pillai (1963) repeated the same lament by opining that "in the remarkable intellectual effort which has resulted in the development of theoretical economics and the evolution of new techniques of analysis, during the present century, our contribution has been insignificant". Since Dasgupta wrote his lament on Indian economists, the latter have fully vindicated themselves of the charge of neglecting economic theory. In capital theory and more generally growth and development theory, as also in international economic theory and welfare economics, Indian economists have been on the forefront during the last decade and a half, as even a perfunctory glance at bibliographical material covered in international surveys of economic theory and the contents of recent journals show.

Biswas (1968:130-142) has raised some of the basic methodological issues in economic research in India. Himself a mathematical economist and econometrician, Biswas begins by pinpointing that the traditional view of the role of economic theory, namely the derivation of meaningful hypotheses which, as contrasted with a tautology, can at least under "ideal conditions" be empirically tested is not enough, since "theory must stand the test of facts before any credence can be lent to it". While laying very stern tests for mathematical economic theory, to which "credence" may be given, Biswas goes a step forward by pointing out that specification of primitive categories (enumeration of phenomena to be included in the analysis) and their relationship, is logically *a priori* to mathematical manipulation of a system of relationships. Such specification of relationships, if operationally meaningful, can be tested with observational data, either in its original structural form (first level or basic hypotheses) as Biswas calls them, or in its reduced form (secondary hypotheses), provided the model is identified in an econometric sense. The moral of the story is a definition of "pernicious" use of mathematics as the "form of using basic assumptions which are obviously unrealistic because they are amenable to facile mathematical treatment". Thus, Biswas's argument, although obviously aimed at the work of contemporary Indian economists, is within the framework of the methodology of modern positive economics and econometric theory. However, his attack is on a more fundamental plane. The social scientist, Biswas argues, has to define constructs (typical?) which explain human behaviour and yet are not cluttered by biographically determined details and this by itself means an understanding of human values and attitudes. Given that the validity of such values and attitudes is not a subject matter of scientific discussion, Biswas chastizes the economist for the simplistic ends-means dichotomy (Biswas, 1972:345-350): "it is neither possible nor meaningful to abstract away from the historical time and space and the attendant cultural complex and hypotheses have to be interdisciplinary in nature". Biswas was emphasising a point of view which historically in the development of Indian economics has considerable influence. We shall return to the point raised regarding the necessity of the development theories related to an economy of the "Indian" type later. Regarding the interdisciplinary approach, it may be noted that, in fact, studies of this type by Indian economists have been very few. (For exceptions, see, for example, specific studies by Gadgil (1959); Raj (1981); Mitra (1967); and Medhora (1965); and studies of a more descriptive and general nature by V.K.R.V. Rao (1971); and V.B. Singh (1971)). Such practical considerations and the need for subjectwise specialisation, which arises from them prompted A.K. Dasgupta to suggest that while economists would need an awareness of other disciplines to lay down realistic boundary constraints of their own inquiries, broad-based inter-disciplinary studies, may lack depth and may degenerate into "cliches" (Dasgupta, 1968).

There is another type of literature which becomes somewhat difficult to classify in the context of the present discussion. For want of a better word, this literature may be designated as consisting of "descriptive" studies. It contains writings by Indian economists consisting essentially of descriptive accounts of various aspects of the Indian economy primarily the agricultural or related sectors, such as tenancy, and land reforms, co-operatives, village studies, etc. The analytical content of such studies has not necessarily been very rigorous. However, quite a large part of the work has been invaluable in providing the background for the analysis of the economy. Again, definitional as well as technical issues, such as survey methodology, have been raised in such studies in addition to the normative policy discussion. (For a listing of some studies of this type with which D.R. Gadgil was concerned, see Dandekar, 1971; for discussion of techniques, Dandekar, 1962; Kamat, 1969; Gupta, 1966; Shah, 1968.)

The methodological questions related to research on an economy, which is generally accepted as different from the "perfectly competitive" model, have been handled in some detail by Kurien (1970). The main interest of his work is on methodological problems arising from a study of different economic systems. He sets the relative pace of his discussion, by pointing out that "self-evident proposition" of Euclidean geometry were deduced from Euclidean assumptions as also certain Euclidean propositions could be derived from non-Euclidean assumptions. Without using the terms explicitly, Kurien sets the stage both for a discussion of the problem of determinateness of a system of logical or mathematical reasoning and the allied question of the "identification" problem in econometrics. Kurien's own conclusion is the methodological view that "theories cannot be proved by testing them against facts because observed facts are necessarily finite in number, possible hypotheses or theories are infinite. If there is one theory that is consistent with the available evidence, there can be many more that are" (Kurien, 1970:14). A.R. Kamat states his proposition in a more general form: "all theories or models used in science are constructs imposed on the empirical reality by the theorizer. In other words, we never know anything in absolute or finality; we can only guess and continue to do so" (Kamat, 1969:100). Kurien does not elaborate why this should necessarily be so. Are all models, to use econometric concepts, necessarily over-identified? Even if this is necessarily so, is it that individual researchers shall always postulate mutually inconsistent parts (as amongst different researchers) of this over-identified structural reality? Or does the difficulty lie in another direction, namely, lack of appropriate data (this Kurien recognises) or non-availability of statistical tools with enough discriminatory power as between different structural specifications? While Kurien does not press the argument at this point, it may be noted that together with other serious economic methodologists (Koppmans, 1957) Kurien ends on a fairly "ambivalent" plane as regards the ultimate logic of the claims of economics as a science. While one may differ on the details of the argument, in our opinion serious work on the history of analytical economic ideas or on applied economics (either for structural analysis or for policy objectives) would support such a view.

Another aspect which may be noted is that as against the plea by Dasgupta and others (Mehta, 1970) for the discovery of universal economic principles, relevant through time and space, Kurien's emphasis, together with Biswas, as noted earlier, is on "space specific" theoretical systems (he is not particularly concerned with dynamic problems). In more concrete terms, the same point has been emphasised by Mukherjee, (1960). He urged inventiveness in the study of the Indian economy and caution in the use of borrowed "conceptual" categories, using illustrations from concepts such as subsistence economy, closed and vulnerable economies, unemployment in self-subsistence economies, farm wages, rural income, farm costs, markets, prices and equilibrium.

There has been a certain amount of discussion in India on the role of the economist as a policy adviser (Dasgupta, 1965). However, this discussion was devoid of significant methodological content. More recently, however, Indian economists have seriously considered the framework of the modern theory of quantitative economic policy as developed by J. Tinbergen. A few important features of this approach may be noted. To begin with, it is taxonomic in character. The emphasis in the approach is not on the derivation of testable hypothesis, but on the construction of workable models with policy content. Again, the approach requires the estimation of quantitative models describing the structure of the economy. However, another important feature is that given the structure of the economy it explicitly relates policy objectives with policy instruments, both in the sense of the adequacy of the instruments in achieving given objectives and given this requirement, estimation in quantitative terms of the numerical magnitudes of policy instruments to achieve the objectives. Thus, while in conventional mathematical or econometric models policy variables were treated as given and the values of the endogenous economic variables derived, in the quantitative policy models variables such as income, employment or exports minus imports have been treated as postulated targets and given the structure of the economy the values of the policy variables derived.

J.K. Sengupta *et al* had recast the Mahalanobis model in a policy framework arguing that the policy problems in the model was the optimal allocation of investment between the sectors of the earlier two-sector Mahalanobis model under alternative planning horizons and alternative sets of values of the output-capital ratio (Sengupta, 1963). Given the structure of the model and the fact that the sum of the allocation ratios was unity, it was shown that in a policy sense the model was a one instrument, one fixed target problem (Sengupta, 1963:30). J. Bhagwati and S. Chakravarty in their review of policy-oriented literature have, at least implicitly, followed the approach of the modern theory of economic policy (Bhagwati and Chakravarty, 1969). Recasting the planning models of the Indian economy (such as the Harrod-Domar model of the First Plan, the Mahalanobis model of the Second Plan, and the consistency and optimisation models of the Third and Fourth Plans) in a policy framework, they discussed in each case, the specified targets in relation to the policy variables postulated in the model (Bhagwati and Chakravarty, 1969). It may be noted in this connection that leaving aside the questions of choice of model and data used, the Fifth Plan approach specified its objectives very clearly ("removal of poverty and attainment of economic self-reliance are the two major objectives" (Fifth Plan, 1973)) and contained a quantitative discussion of the relationship of different production targets (policy variables?) with the twin objectives, as derived through a structural model of the economy. Alagh and Shah have experimented with this approach in the context of a short-run model of capacity utilisation in the Indian economy (Alagh and Shah, 1972), in which the vector of sectoral excess capacity estimates is a target and given the technological structure of the economy, agricultural production and trade balance constraints, the feasibility of deriving sectoral final demand estimates is explored as a policy variable.

Reviewing the book by R.S. Eckhaus and K.S. Parikh, Rudra underlined some of the basic features of the approach under discussion very neatly. He points out that "there are many problems of quantitative economics which can be analysed and understood only by comparing results under varying parametric conditions (Rudra, 1972:337-342). Characterising the book as "a model-maker's model", Rudra points out that "the lessons the other model-makers may draw from the results presented in the book are enormous. These are lessons that cannot be drawn from any economic theory nor from any amount of exercises with algebra or calculus but require exactly the type of repeated parametric variations that the authors have carried out" (Rudra, 1972). The taxonomic nature of the approach is also brought out by the observation that "in situations of ignorance, the fewer unknown parameters and relations one assumes the better..." (Ibid:337).

Another feature of quantitative policy models has been the characterisation of the structural features of the economy, according to hierarchical principles or alternatively the decomposition of larger policy problems into manageable subsets. J.K. Sengupta and others had shown that the co-efficient matrix in the four-sector Mahalanobis model was triangular implying the unilateral dependence of the consumption goods sector on the investment goods sector (Sengupta, Fox and Thorbecke, 1966:302), Manne and Rudra had decomposed the Indian economy into two block diagnoal subsets (Mining, Metals and Machinery; Food and Fibres) both integrated with a third set (Universal Intermediaries). This feature of the economy was used to argue that the import substitution programme of the economy could be considered independent of the agricultural and wage goods expansion programme (Krishnamurthy, 1964). J.K. Sengupta (1963) has also explored this proposition. Y.K. Alagh (1967) had shown that the decomposibility proposition held only if the relation between wage incomes and wage goods demand was ignored. Later, the problems of the spatial allocations of industrial activity in India has also been shown to decompose in an economically meaningful manner (Alagh, 1972; Alagh, Subrahmanian, and Kashyap, 1971). It may be noted that Tinbergan had anticipated this feature of policy models.

The quantitative economic policy approach seems to provide for further rewarding work. The essence of the approach seems to be flexibility in specification of economic systems in the light of a "feel" of the economy and available data, the ability to improve models sequentially in the light of earlier work and to relate operational models with policy problems. Such work may also provide the "results" from which sounder empirically based "theoretical" propositions on the Indian economy may emerge. A more recent advance has been the development of sub-models in the context of an overall planning model. These have been constructed for sectors or specific problems e.g. "agricultural sub-model", "employment sub-model" and "nonrenewable resources" sub-model (Planning Commission, May, 1977 and 1982).

There has during the last decade also been interesting discussion on what is loosely called the mode of production debate in Indian agriculture. The main contributors argue that Indian agriculture has developed within the outlines of a colonial economy and the impact of imperialist and colonial trade patterns on structural factors is brought out. The debate then centres on whether the mode of production in Indian agriculture is semi-feudal or capitalist. There is considerable discussion on the nature of classes in Indian agriculture. It is by now generally recognised that capitalist pattern of development has emerged in Indian agriculture on a substantial scale. The debate has been primarily carried on by Indian authors, namely A. Rudra, J. Patnaik, N.K. Chandra, J. Banaji, P.H. Prasad and A. Bhaduri, although Western scholars working on Indian field data have contributed and so have experts with an ideological construction (Alvi, Frank, Thorner and Thorner). The literature has recently been surveyed (Thorner, 1982).

II. Infrastructures for Teaching and Research

1. Introduction

Teaching and/or research in economics in India is conducted in the university system, in specialised social science research institutes and in specialised functional research institutes or departments e.g. those engaged in management studies. Information on each is presented below. It is based on our own enquiries, information from the University Grants Commission, Indian Council of Social Science Research and other sources of secondary information. An important sector, namely, colleges affiliated with the university system had to be dropped, because no easy source of secondary information was available and given the vast nature of the sector, it was not possible to collect information with our own resources.

2. University Departments

Information pertaining to 46 university departments of economics is discussed below. A general picture of the extremely uneven development of the university structure in economics is conveyed, although the numerical precision of the presentation needs to be qualified at the outset, both because of the reason of non-response and incompleteness of many of the answers. Thus, the numbers should be interpreted as broad orders of magnitude, rather than precise indicators.

The ages of the departments ranged from 1 year to 70 years. The average age was about 23 years, and the median age was 18 years. Fifteen per cent of the departments were less than 5 years old.

The departments offered M.A. and Ph.D. degrees. Thirty-nine per cent offered M.Phil. courses and 30 per cent were involved in undergraduate teaching in addition to their post-graduate responsibility. In addition to the traditional courses, other courses are also offered, e.g.:

(i) M.S. University of Baroda runs a One-Semester Economics Diploma Course in Home Science Faculty.

(ii) Marathawada University runs a Post-graduate Diploma Course in Co-operative Management.

(iii) Madras University and Osmania University run parallel M.A. courses in Applied Economics/ Econometrics.

(iv) Panjab University runs a One-Year Honours School Course in Economics.

(v) Punjabi University has started a 3-year B.A. Honours School Course.

(vi) Utkal University runs a Diploma Course in Social Science.

(vii) University of Bombay has provision for M.A. by research.

The annual student enrolment in the M.A. course ranges between 6 and 445, the average being about 100. The average annual student enrolment in the undergraduate courses in the 12 departments which offer them and have supplied information ranges between 25 and 1,428, the average being about 445. The undergraduate course is over-crowded in 7 departments. The average annual student enrolment in the M.Phil. course in the departments which offer them ranges between 5 and 45, the average being about 14.

The total number of approved posts of teachers in the 46 departments ranges between 2 and 31, the average being about 12. The bottom 9 per cent of the departments have less than 5 teachers each, while the top 9 per cent have more than 20 teachers each. The number of approved posts of professors ranges between 1 and 10, the average being 2. Fifty per cent of the departments have only 1 professor each. The number of approved posts of readers ranges between 0 and 10, the average being about 4. For the approved posts of lecturers from 1 to 16, the average being about 6. The number of vacancies in the faculty ranges from 0 to 6, the average being more than one. The number of teachers with research degrees falls within the range of 1 to 15 with an average of about 4.5 per department. On the average, 45 per cent of the existing faculty members have research degrees.

As between the different departments the teacher-student ratio varies widely between 1:6 on the one end and 1:111 on the other end. If the post-graduate students are taken as the basis, the average ratio comes out to be 1:21. All the departments with undergraduate responsibilities have highly unfavourable teacher-student ratios. In about 10 per cent of the departments this ratio is unfavourable due to over-crowding in the M.A. course.

The number of books in the library ranges between 2,000 and 176,000, the average being about 18,000. About 32 per cent of the departments at the bottom have less than 5,000 books each, while the top 6 per cent of the departments have more than 50,000 books each. The number of journals subscribed ranges from 14 to 157, the average number being 54. The departments in the bottom 8 per cent subscribe to less than 20 journals, while those in the top decile to 100 and more. So far as the number of foreign journals subscribed is concerned, the range is from 4 to 127, the average number being 29. The bottom 19 per cent of the departments subscribe less than 10 foreign journals, while the top 6 per cent, 60 and above. About 40 per cent of the departments do not have any computational facility, while 5 per cent of them have highly sophisticated and costly arrangements. The average number of calculators is 7 and the average capital cost in this respect is Rs.29,000.

The number of full-time research students working in the departments ranges between 1 and 63, the average number being 13. The bottom 31 per cent of the departments have less than five full-time research students each. The top 14 per cent of the departments have 30 or more full-time research students each. The output of Ph.D. degrees during the last ten years varied between 0 and 59 in the departments that are more than ten years old. The average output during the last ten years is: the bottom 61 per cent of the departments produced less than 10 research degrees each; the top 8 per cent of the departments produced 40 Ph.D.s or more each.

On the average, 7 research and survey projects were completed by each department during the last ten years. But 13 per cent of the departments did not have any such project to their credit, while the top 8 per cent of the departments completed more than 50 per cent of the total number of projects. The picture is similar in regard to the number of on-going research projects. On the average, 2 projects are in progress in each department. But 36 per cent of the departments do not have any such projects in hand, while the top 7 per cent of the departments have about 47 per cent of the on-going projects. On the average 3 workshops/seminars/conferences, etc. were organised by each department during the last ten years. But about 8 per cent of the departments did not have any such thing to their credit, while the top 8 per cent of them had nearly 30 per cent of all such meetings.

Fifteen different thrust areas could be identified in all the departments taken together. These are (1) Development Economics and Economic Planning, (2) Agricultural Economics, (3) Public Economics and Public Finance, (4) Monetary Economics and Banking, (5) Quantitative Economics and Econometrics, (6) Economic Theory, (7) Statistics, (8) International Economics, (9) Labour Economics, (10) Industrial Economics, (11) Regional Economics, (12) Demography, (13) Economics of Education, (14) Economic History, and (15) Mathematical Economics. Of these, the first four are the most popular with 34 per cent departments having reported it, followed by Agricultural Economics (26 per cent), Public Economics (26 per cent), and Monetary Economics (18 per cent).

The department of economics of the Punjabi University, Patiala, has reported that it has been servicing courses in "Economics of Socialism" since 1973 and has been gradually developing teaching and research programmes in this area. "Economics of Socialism" also appears as one of the major thrust areas.

Seventy-eighty per cent of the departments have specialised teachers in the areas of agricultural economics, public economics, monetary economics, and development economics; 60-70 per cent in the areas of industrial economics and quantitative economics; 40-60 per cent in the areas of international economics and labour economics; 30-40 per cent in the areas of economic thought; 20-30 per cent in the areas of demography, regional economics and economics of education; 10-20 per cent in the areas of co-operation, rural economics and transport economics; and less than 10 per cent in the areas of urban economics and economic history.

So far as the teachers are concerned, 15-17 per cent of them are specialised in the areas of agricultural economics and development economics, 11-14 per cent in quantitative economics, monetary economics and public economics, 7-9 per cent in labour economics, industrial economics and international economics, 3-5 per cent in demography, regional economics, economics of education, and economic thought, and less than 3 per cent in rural economics, urban economics, transport economics, economic history, and co-operation.

The overall position is summed up by a recent U.G.C. Report as follows:

> Taking the average figures on different aspects noted above, one can draw a picture of the *Representative University Department of Economics* in India. In doing so we have ignored the heavy under-graduate burden of some Departments and to that

extent the picture is unrealistic.

The Representative Department is about 23 years old. It annually teaches about 100 students in the M.A. course and about 6 students in the M.Phil. course with a teaching strength of 11.7, consisting of 2 Professors, 3.6 Readers and 6 Lecturers. It has 4.5 teachers with research degrees. In addition, it has 2 posts of Research Assistants in the faculty. On the average, one teaching post remains vacant for change of jobs and other reasons. The teacher-student ratio in the Department is 1:21.

Its research enrolment consists of 12.4 full-time research students and 2.6 teacher Fellows working in the Department. It produces 13 research degrees in a period of ten years. Each Professor and Reader guides 3 research students on the average.

During a period of ten years, it completes 7 Research and Survey Projects, sponsored and financed by various national and state level institutions. It has 2 such on-going projects in hand. It organises 3 workshops, seminars, etc. on improvement of teaching, research methodology, modernisation of syllabus and similar subjects in a period of ten years.

The library of the Department possesses about 18,000 books, and it subscribes to 54 journals, 29 from abroad and 25 from within. A sum of Rs.83,000 is spent by it on books and journals in a period of three years. It is provided with moderate computational facilities consisting of 7 calculators worth abut Rs.29,000.

On the basis of the major fields of specialisation of its faculty members, the Department has two thrust areas, a thrust area being identified by three or more specialised teachers in it. In all probability, the thrust areas belong to two of the four fields, viz., (1) Development Economics and Economic Planning, (2) Agricultural Economics, (3) Public Economics and Public Finance, and (4) Monetary Economics and Banking.

> On the basis of the UGC criteria, it barely comes under the 'developing' category. One must note, however, that the above characterissation of the Representative Department conceals an extreme degree of inequality in regard to resources and achievements, even leaving aside the universities recently started. In fact, if the two mammoths, Bombay and Poona, are excluded, the Representative Department of Economics in India presents a pitiable picture of under-development (U.G.C., 1982).

3. Social Science Research Institutes

The development of economics in the social science research institutes of India shows a more even level. Resource endowments are higher. At present, there are 18 such research institutes. Out of these, five have a major focus on economics and in another three, economics or applied areas related to it are an important component. These institutions together with their expenditures in 1980-81 are as follows:

Serial No.	Name of the Institute	Committed Expenditures in 1980-81 (Rs. lacs*)
A.	Major Focus on Economics	
1.	Centre for Development Studies, Trivandrum	30.05
2.	Giri Institute of Development Studies, Lucknow	14.82
3.	Institute of Economic Growth, Delhi	25.50
4.	Madras Institute of Development Studies, Madras	5.39
5.	Sardar Patel Institute of Economic and Social Research, Ahmedabad	23.18
B.	Economics : An Important Component	
1.	A.N. Sinha Institute of Social Studies, Patna	10.70
2.	Centre for Studies in Social Sciences, Calcutta	12.28
3.	Institute for Social and Economic Change, Bangalore	18.24

*a lac (or lakh) is one hundred thousand

a Rupee is $\frac{1}{12}$ of a U.S. dollar

The support staff for secretarial and computational facilities is generally adequate. Library facilities and modest travel facilities are available. The staff strength of trained researchers ranges between 4 to 23 in these Institutes. Staff is generally of high calibre with either advanced research degrees or demonstrated research competence. For the year for which data was available on research output, (generally 1980-81), it was seen that more than sixty per cent of the research work was being done on a collaborative basis, by teams of 2 to 4 scholars. All the institutes took project funds, the sources ranging from international agencies to national and state government agencies, but also in some cases voluntary and even some private groups. For many of the research institutes project funds was not a problem.

The research institutes showed considerable flexibility in recruitment procedures, although in all cases recruitment had to be endorsed by a Committee including high level specialists. There was generally flexibility in posts apportioned at the Reader/Professor level. Some of the institutes have 8 to 10 full level professor's positions in economics. The average annual expenditure in journals in economics is placed at around Rs.40,000 although some spend more than twice that amount.

The research staff of the institutes offer consulting and advisory services at the international, national, and regional levels. Many offer small specialised training programmes and almost all are training students for doctoral degrees. Expertise in quantitative economics and computer aids is available.

III. Major Trends in Research

Questions of impacts of the freedom movement and the colonial period on Indian economic research have already been discussed in Part I. That discussion also includes a survey of the literature of a methodological nature on the need for an "Indian" economics. The Indian Council of Social Science Research has completed a major effort on Survey of Research in Economics in India in seven volumes (Indian Council of Social Science Research, 1975-1978). These are not repeated in this chapter, but only major trends of additional work are looked into. A large number of descriptive studies are not reported, because the Indian economic literature is indeed extensive.

Interesting studies on population research have shown the interlinkage between population related factors and socioeconomic variables. Impact of higher agricultural output and improved public distribution systems of foodgrains on nutrition and poverty levels, of decentralised health services, infant mortality rates, education of girls and women and women participation in the labour force on fertility rates have been noted (Centre for Development Studies, 1976 and Krishnan, 1977). The Working Group on Population Policy recommended the integration of socio-economic variables with population policies and breaking up the country into different zones, for achieving population policy objectives of a Net Reproduction Rate of 1 by the year 2,000 A.D. (Planning Commission, 1980). While the past trends in labour participation rates and of the population dependent on agriculture have been stable, the 1981 Census data tend to show that in some States there is a shift away from agriculture. In Gujarat, for example, recent studies show that the population dependent on agriculture has declined by 15 percentage points over two decades (Visaria, 1981). The 1981 Census does not show an appreciable decline in the population growth rate as forecast earlier, but the absolute volume of the population was 10 million higher than the earlier projections of the Expert Group on Population Projections. These and other aspects relating to population and work force data are currently being studied in view of the changes in concepts and definitions as also the possibility of improvements in data collection methods through time (Visaria and Visaria, 1981).

There has been considerable controversy on the relationship between poverty and unemployment. The National Sample Survey, in addition to the usual measures of unemployment by persons, since its 27th Round, has also been giving estimates of person days of utilisation of labour time, to measure disguised unemployment. In some regions of the country, it was shown that the unemployment rate was higher in the poorer groups of the population, particularly landless labourers (Visaria, 1981). On the other hand, it has been argued that the percentage of the poor is much greater than the unemployment rates and, therefore, the problems of poverty removal are more complex than that of employment generation (Lakdawala, 1978). Relationships have been estimated between agricultural employment and agricultural output and input variables, although there is some controversy on the specified quantitative magnitudes involved (compare, for example, Alagh, 1979 with Vyas and Mathai, 1978). Some analysts have shown that the distribution of land has an important bearing on the generation of agricultural employment (higher employment rates determined by more equal distribution of land). Other analysts have argued, on the other hand, that production input planning, crop composition, and price policy variables are also important (for an example, review of the various studies, see Dantwala, 1979).

There has been an extensive debate on the measurement of poverty. The earlier tradition was to measure the poverty line in terms of the consumption budget with which the consumer is able to buy a food basket which meets a minimum calorie requirement (Dandekar and Rath, 1971). It has been argued that this approach does not adequately take care of within group variations arising from work status, age, sex and the intrinsic biological variations of calorie requirement and, in fact, the cut off point is lower (Sukhatme, 1981). This led to an extensive discussion in the literature with one set of scholars arguing that the higher poverty norm has to be used for planning purposes and the other set arguing for the lower level from the view point of nutritional requirement *per se*. The Planning Commission estimates demand parameters separately for the rich and the poor, rural and urban, for major commodities using linear expenditure system and for a larger number of commodities using best fitting Engle curve (Planning Commission, 1979). They also estimate poverty proportions by using two povery lines; the second is a modified poverty line which takes care of the critics who argue that the conventional poverty line does not take care of within group variations. There has been less work on determinants of poverty and unemployment although studies tend to show that agricultural growth and cereal prices have an effect on poverty proportions (Sinha, 1981).

There have been considerable developments on plan modelling in the seventies. The basic plan model in India was an input-output model with a macro-model determining aggregate outcomes and a consumption sub-model modelling redistribution goals (Planning Commission, 1973). Extensive work was done to model the investment requirements of agriculture and to introduce employment considerations in the planning strategy by the formulation of an agricultural sub-model and an employment sub-model (Planning Commission, 1977). The latter has been substantially improved in the sixth plan (Planning Commission, 1981). Capital has now been endogenised in the Indian planning framework and the Sixth Plan uses a linear programming formulation. Critics have argued the need for greater improvement in the data base (Majumdar, 1982). On the agricultural sub-model, the more explicit introduction of agricultural price policy in determining acreage responses has been argued (Narayana and Parikh, 1979).

Regional differentiation in Indian agriculture has been extensively studied (Bhalla, Alagh, 1982; Dharam Narain, 1977). It has been shown that in about a sixth of the country's gross cropped area, the growth rate in agriculture is about 5 per cent per annum. While in the remaining 2/5th it is around 3 per cent, but some areas have shown negative growth. The explanation of growth in terms of increase in land area is now marginal and cropping pattern and pure yield effects are now high. There has been some controversy on the growth rate in agriculture in the post-green revolution period as compared to the earlier period (compare T.N. Srinivasan, 1979, with N. Rath, 1980, and Alagh and Sharma, 1981). It has been argued that the weather plays an important role in fluctuations in agricultural output and this leads to difficulties in comparing growth rates (Mukherji and Vaidyanathan, 1980).

Most analysts are agreed that given the population pressure the Indian economy will face, policies which give explicit weight to different programmes in favour of depressed regions and disadvantaged sections of the rural population will be required through the year 2,000 (Vyas et al, 1980).

In the field of industrial development, Chakravarti (1979) and Bagchi (1981) have argued that demand deficiency is becoming a constraint on account of income distribution factors. Other scholars have questioned this analysis. At the regional level some studies have argued that the distribution of public investment and efficiency in the use of infrastructure, particularly power capacity, have determined growth rates (Alagh et al, 1981). While the industrial development rate has not been high in the 1970s, a substantial redeployment of capital between industries has been documented (Mundle, 1981). The difficulties of developing the small scale sectors have been extensively documented and caution urged on excessive reliance on this sector for achieving societal objective (Sandesara, 1980).

Studies have shown that terms of trade moved against agriculture in the mid-1970s (Kahlon and Tyagi, 1983) and recently an official working group has commented that this may have led to a rise in aggregate saving rates. The substantial increase in aggregate saving and investment rates have been noted, although the impact of rising capital prices on the level of real investment rate has been commented upon. There has been some controversy on the incremental capital output ratio in the Indian economy. While this parameter has been rising, some analysts suggest that this is on account of the composition of investment and the increase in capital cost (Working Group on Savings, 1982).

Interesting work has been completed on the determinants of saving in the Indian economy. Income growth and terms of trade variables have been shown to have played a role (Krishnamurtai and Saibaba, 1981). Models of price determination have been built which use both the monetary variables and other of a non-monetarist variety. This problem remains unresolved.

The tradition of research on regional economics has continued (for an earlier survey, see in ICSSR, Vol. I). Analysis has been conducted using fairly sophisticated quantitative techniques, (see for example, Alagh, Bhalla, and Kashyap, 1980). An extensive set of studies have been underway on examining the relationship between population growth, work force distribution, agricultural growth, distribution of land, and agricultural wages (see Kurien, 1980).

Work relating to international trade and payments has tended to argue the need for selective policies of import substitution and export promotion, related with the domestic resources cost of the Indian economy. Recently, it has been argued that conventional international comparisons on prices lead to very distorted policy implications (Nambiar, 1982) and that the so-called distortion effects of trade policies relating to India may be exaggerated.

Work on energy system has tended to highlight the need for curbing the consumption of middle distillates in the Indian economy and of taking into account the non-renewable energy constraints in output planning (Parikh, 1980). Considerable efforts have been made in designing socio-economic systems related with the use of non-renewable energy resources including animal and vegetable wastes and social forestry programmes. The need for more efficient transport planning and the relationship of such planning with energy planning and modifications in freight policies to reflect the real cost of transport have been outlined (National Transport Policy Committee, 1980).

Work on teaching of economics has tended to show the intensively dualistic system of teaching in India, with elite institutions incorporating the latest advances in research and teaching material, but a vast mass of the educational institutions suffering from poor resources, overcrowding, and meagre facilities (Rao, 1977, and UGC, 1979).

The importance of the quality of human capital has been documented in a set of studies (for example, Baldev Singh, 1972). Most studies tend to show high social rate of return on programmes relating to functional literacy as compared to higher education in India (Panchmukhi, 1978; and Lakdawala, 1978). Recently, in an important paper, Tilak (1981) has shown that rates of return for education are higher for underprivileged groups, but human capital is unequally distributed and there is evidence of wages and income discrimination. High social rate of return of spreading health facilities in rural areas has also been documented (Lakdawala, 1978).

IV. *Problems and the Agenda for the Future*

As noted earlier, the basic problem of the profession of economics in India is the dualism that underlies its development both in teaching and research. There are institutions which are well endowed and compare well even on an international scale. Yet, there are substantial problems of development for a large number of institutions outside the framework of the elite institutions. On the positive side, the profession of economics in India has reference points within the country. The professional institutions are active. Apart from general economics, they cover specialised fields like labour economics, agricultural economics, econometrics, national income and wealth, managerial applied economics and industrial relations. The only major field without a professional association is industrial economics. Most of the associations sponsor journals and periodicals and other specialised publications (Seminar reports, etc.). In addition, there are journals which provide ample opportunities to the Indian scholars, to publish their work. A journal like the *Economic and Political Weekly* sustains lively debate and the Indian economists working in academia, industry or government can write, and do write, for a reference audience of their own within the country. The best Indian economists publish all over the world and participate extensively in international consulting and discussion.

There is an extensive market for Indian economists. The demand for academic economists have been expanding both in the university system and in research institutes. At any moment of time, positions are available from the level of professor downwards waiting to be filled. The government of India uses economists on an extensive scale. In the early fifties, a system of economic advisers was set up in every major ministry. Supporting staff is required. In addition, there are bodies like the Reserve Bank of India, the Bureau of Industrial Costs and Prices, the Agricultural Prices Commission, Forward Marketing Commission, etc. which employ economists on a substantial scale. An Indian economic service has been set up. It recruits about 50 individuals annually through a competitive examination. In-service training facilities are provided. Banking and industry are now using economists in advisory capacities as also trading and other groups, for example, Food Corporation of India, State Trading Corporation, various Commodity Boards, and associations.

Well qualified economists generally get employed very quickly. Studies, however, show that the waiting period for a post-graduate in economics from an average Indian university can extend up to 24 months. A graduate from an Indian university, with training in economics can remain unemployed up to 5 years. Even after employment in many colleges and also in some universities, promotion prospects are poor leading to considerable frustration for a number of individuals in the profession.

The need is basically to integrate on a larger scale the training of a vast majority of Indians qualified in economics with the development that takes place in the best part of the profession. The University Grants Commission provides fellowships for teachers which protect the teachers pay and permit them to spend periods up to 2-3 years in centres of advanced learning. The ICSSR provides facilities for training programmes in research methodologies in advanced institutions; it also has consultancy schemes for data processing. These facilities need to be coordinated and as the Review Committee of the Indian Council of Social Science Research has suggested, advanced institutions of economics in India need to give higher priority to such extension and training work. An earlier proposal for the M.Phil. requirement being made compulsory for college and university teachers, in order to get the benefit of improved scales of pay was subsequently relaxed. Greater effort needs to be made in the direction of upgrading of skills.

At the under-graduate level teaching has switched over to the regional languages in many universities. The translation of materials into the regional languages is adequate in those states which have a large clientele. In Hindi, which is used in six states, major text books required for post-graduate education in economics are available, but it is not so in other linguistic regions, where the clientele is smaller. Special efforts need to be made for strengthening translation of material in such languages and also translation of selected journal articles. Efforts for the upgrading of curricula are already under way and need to be strengthened.

Note: The substantive research on this project was done while the author was with the Sardar Patel Institute of Economic and Social Research at Ahmedabad. However, it was completed when he was with the Agricultural Prices Commission, Government of India. Views are of the author and not that of his employers.

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THREE

SRI LANKA: *K. Dharmasena*

I. *Brief History of the Introduction of the Discipline in the Country*

Sri Lanka has an ancient tradition of Institutions of higher learning, with an ecclesiastical bent existed as far back as the beginning of the Christian era, the *Mahavihara* and *Abhayagiriya* being such pre-eminent seats of higher learning. Secular studies such as medicine, law, economics, art and architecture, too were taught in addition to language, literature and Buddhist studies. It is most likely that renowned works like the *Arthasasthra* of Chanakya, a reputed scholar in the Indian Gupta age, were used to impart skills needed to run large establishments with efficiency.

The Colebrook-Cameron Reforms of 1833, during the British colonial period, made an indelible impact on social conditions, particularly on the development of education with a great deal of emphasis on English. Colebrook recommended "the improvement of our native subjects in general so that the higher classes among them should be rendered morally and intellectually competent to fill offices of trust". Colebrook's recommendations had a lasting impact on the elementary and secondary educational systems of the country, and paved the way for tertiary education within the first quarter of the twentieth century.

At the end of the 19th century, Sri Lanka (then Ceylon) possessed a fairly developed system of elementary and secondary schools. These secondary schools mostly founded and run by Christian Missionary Societies were known as "Colleges" because they provided courses leading to university, or at least to the Intermediate Examination. The latter course may be regarded as the precursor of the Island's modern higher education system. The Island's premier government school, the Colombo Academy (which was re-named Royal College in 1881) was the first "College" to provide some form of modern university education. This institution prepared students for the external examinations conducted by the University of London. However, at that stage few students proceeded beyond the Intermediate Examination and the examinations conducted by the University of London were first held in the Island in 1881 (Melalasekara, 1964:868-9).

With the emergency of a western educated elite in the latter half of the last century these examinations began to gain popularity especially in the period after 1910. But in these examinations, applicants for economics were few or none in certain years.

This was because (i) the demand for employment from the public and private sectors was least for economists, and (ii) the "Colleges" preparing students for such examinations had hardly any facilities to teach the subject.

Between 1910 and 1922 while a total of 507 and 321 candidates took the Inter Arts and Inter Science Examinations respectively, the total number of candidates appearing for the Inter Science (Economics) Examination in the same period was only four. On the other hand not a single candidate appeared for the B.Sc. (Economics) Degree Examination during the same period whereas the respective numbers for B.A. and B.Sc. Examinations were 81 and 38. From the third decade of this century the discipline of economics began to attract students due both to qualitative and quantitative improvements in the teaching of the subject and to the developments in the political and economic spheres creating a need for more and more economists.

The country had its University College established on January 24, 1921, which was a government institution affiliated to the University of London, and thus followed its syllabi. In keeping with the British system, education at this College had to be paid for. Besides, residential facilities were limited. It was, therefore, confined almost exclusively to persons of comparatively affluent circumstances. The inevitable outcome of such a policy was the tardy and niggardly expansion of higher education in the ensuing years. In 1921, the total student enrolment was 166; it increased to 335 in 1931, and to 904 in 1942. This was a very modest increase compared to the expansion in higher education that took place with the introduction of free education in 1944.

The courses provided at the University College were for the London Intermediate and Final (Arts and Science) Examinations, the training of secondary teachers, the first year Medical Examination and the London Intermediate and Final Science (Economics) Examination. There were three Faculties -- Arts, Oriental Studies, and Science. Although the discipline of economics was introduced in the University curriculum, it was not given independent status while Honours Courses were provided for in disciplines like Pali, Sanskrit, Sinhala, Western Classics, English, and History. Instructions in economics were given at the General Degree level only and, as is evident from the available figures given in Table 1 even at the General Degree level the student enrolment for economics was very low. This was partly due to the better avenues of employment opened for those following disciplines like Western classics, English and history and the lack of qualified teachers for the subject of economics. It also explains the comparatively few applications for the London Intermediate and Final Science (Economics) Examination as private candidates in the 1920s and 1930s. The figures are given in Table 2.

TABLE 1

University College
Undergraduate enrolment for Economics
at General Degree level 1927 - 1934

Year	Total enrolment	Economics
1927	279	15
1928	315	19
1929	339	16
1930	394	19
1931	355	18
1932	377	22
1933	417	--
1934	449	28

(Source: Ceylon University College - Prospectus - Annuals)

TABLE 2

University of London
The number of candidates who sat
the Intermediate and Bachelor's Examinations in
Ceylon, 1922-37 (Quinquennial Averages)

Period	Inter Arts	Inter Science (Economics)	B.A.	B.Sc. Economics
1922/27	134	05	38	0
1928/32	194	05	48	2
1933/37	269	56	70	5

(Source: *Education in Ceylon*: *A Centenary Volume*, Part III: 1262 and 1265).

In a situation where the discipline of economics was enjoying comparatively lower status, it was logical for the Academic Committee of the University College to place economics within the Department of History in the allocation of subjects among departments.[1] From 1921 to the establishment of the University of Ceylon in 1942 the discipline of economics was taught in the Department of History with S.A. Pakeman as the Head of the Department. Moreover, in the long period of nearly twenty years instructions in economics were given by two lecturers namely B.B. Das Gupta and P.J. Thomas.[2]

Those who initiated the university movement during the first decade of this century had high ideals of university education. They were convinced that external examinations conducted by British universities were no substitute for a university proper. Their primary aim was to establish a university adapted to local needs. Indeed, the early agitators regarded a university as an essential feature of national revival. In economics, it meant the development of curricula with a local bias so as to promote the growth of a body of indigenous economic thought. But so long as the main function of the University College was to prepare students for external examinations of the London University, no such reorientation of the curricula was possible. The teaching of commerce agronomy, rural economy and other branches of applied economics, which was of fundamental importance to understand the requirements for the development of the country was not given any weightage in the syllabi. Instead, the subjects taught for both Intermediate and Final Examinations were Principles of Economics, Industrial History, Currency and Banking, and Public Finance as they relate to English and American conditions.

1. The University of Ceylon 1942 - 1959

The establishment of the University College in 1921 did not in any way stifle the university movement that had its beginnings in the late 19th century. From the outset, the University College in Colombo was treated as nothing more than a half-way house to a national university. The legislation for its transformation to this latter status was ready by 1925. But the establishment of the University was postponed for over a decade for a variety of reasons: the prolonged controversy over the question of where it was to be located; and the complex governmental structure of the Donoughmore system which came into existence in 1931. Finally, it was as late as in 1942 that the University of Ceylon was born, with its seat in Colombo.

2. The Department of Economics of the University of Ceylon 1942 -1959

In 1942, the University of Ceylon had four major Faculties: Arts, Oriental Studies, Science, and Medicine. For the first time, economics, received independent status by the creation of a separate department for the discipline in the Faculty of Arts. Sociology, first, taught in the Department of Economics was separated and established as an independent department in 1949 (Malalasekara, 1969:877-8).

The establishment of a separate Department for economics within the Arts Faculty coincided with some happy events for the discipline to acquire important status within the social sciences in the University. The Donoughmore constitution that came into effect in 1931, besides granting universal adult franchise entrusted the elected representative with power and responsibility in some key spheres of social and economic activity. Education, land, irrigation, agriculture, industries, commerce and fisheries were some of them. Coupled with the encouragement received from the grant of universal adult franchise such responsibilities helped to widen the economic horizons of the country. Independence in 1947, on the other hand, spelled the need for economic self determination. Thus the post independence period up to 1960 saw the establishment of the Central Bank; the expansion of commercial banking and financial institutions, the rise of public corporations; beginnings of industrialisation; land reforms; and an implementation of a programme of nationalization. Above all, like in most Third World countries, Sri Lanka too developed a "craze" for economic planning in the 1950's (Hettne, 1982:102). All these developments created a great demand for economists.

In the social sphere, the noteworthy developments were the educational reforms; such as, the introduction of free education from the kindergarten (now grade 1) to the University. The object of the free education policy was to provide access to an English education, a *sine-qua-non* for entry into white collar jobs or institutions of higher education to the poor students. This reform was accompanied by the use of national languages as the media of instruction for all pupils in the primary classes. Both reforms came into effect in 1945.

These developments, no doubt, were for the greater advantage of the discipline of economics in the University. Developments in the economic field which opened prospects of employment for economics graduates was an inducement for students entering the university to read economics for the degree examinations. Unlike most courses in social sciences and humanities, the course in economics, at the University during this period could be chosen as a subject without any prior preparation. In the late 1940s, although the subject of "Government" was introduced at the University Entrance Examination for those intending to follow courses in economics at the University they were not expected to have any knowledge of the "Principles of Economics" (Jennings, 1948:52-54). The Department of Economics, therefore, had a wide choice in the enrolment of students. However, that choice was restricted by the controlled admission policy of the University which lasted for nearly two decades due largely to the provisions of the University Act. The Act decreed that the University of Ceylon was to be, as recommended by the Buchanan - Riddle Commission of 1929, unitary, residential, and autonomous. In terms of this Act, the University could not have a number of campuses in different parts of the Island. Its expansion was, therefore, limited both by it being unitary and residential. The word autonomy guaranteed its independence which made it less responsive to social and economic needs. Therefore, in spite of the greater demand for the expansion of higher education due to the impact of free education the University policy was conservative and restrictive. The contention of the University on admissions was that, since education was at the expense of the state it was difficult to justify the provision of higher education beyond the employment needs of the country. Consequently, the expansion of the Department of Economics in terms of student enrolment in the first place was determined largely by the admissions to the Arts based courses in the University. The Table 3 shows that in the 1940s and 1950s, the admissions to both Arts and Oriental faculties of the University was slightly on the decline. Within the period of restrictive admission policy the Department of Economics, however, progressed much better than other Arts oriented disciplines. The subject-wise distribution of undergraduates registered for the General Degree Courses during this period was difficult to get. But the data pertaining to Honours courses within the Arts Faculty, given in Table 4 show that economics had made headway over other social science disciplines.

A comparatively large number of students specialising in economics in the 1950s was evidence of the demand for economics graduates. Similarly, as shown in Table 5 there was also an increasing number of candidates sitting the London B.Sc. (Economics) Degree Examination from Ceylon in the late 50s.

The table shows that in the 1957-1961 period nearly 34% of the total number of candidates sitting the Arts based Degree Examinations appeared for the B.Sc. Economics Degree.

TABLE 3

Numerical and Percentage Distribution of full time students in the University of Ceylon.

Year	Total students	% of students in Arts based courses	% of students in Science based courses
1942	904	43.8	56.2
1947	1,554	41.6	58.4
1952	2,232	40.6	59.4
1957	2,718	40.3	59.7

(Source: Education in Ceylon: A Centenary Volume, Part III: p 886).

TABLE 4

Undergraduate enrolment in Honours Courses in the Faculty of Arts 1942

Period	History	Geography	Philosophy	Economics
1942/46	17	18	02	43
1947/51	23	17	11	77
1952/56	34	33	09	77
1957	25	53	03	77
1958	33	53	04	90
1959	31	77	07	96

(Source: University of Ceylon Council Reports (Annuals)).

TABLE 5

University of London
Number of candidates appearing
from Ceylon for the B.A. and B.Sc.
(Econ.) Degree Examinations 1942 - 1961
(Quinquennial Averages)

Period	B.A.	B.Sc.
1942/46	101	30
1947/51	203	61
1952/56	238	57
1957/61	450	235

(Source: Education in Ceylon: A Centenary Volume, Part III: p 1264).

3. Curriculum Development Under the Single University System

Reference was made earlier that one of the aims of the pioneers of the University movement was to have a university adapted to national needs. The University College however failed to fulfil that aspiration due mainly to the fact that it was affiliated to the University of London. From the inception the University of Ceylon, on the other hand, was an autonomous body that had power to conduct its own examinations and develop its own teaching curricula independent of outside influences. But this did not happen. The main factor behind the continuance of that system of teaching under the single university (1942-1959) was the autonomous status enjoyed by the institution. The autonomy insulated the university from government directives and outside opinion making, the only seat of higher studies in the country insensitive to rapid socio-economic changes taking place in post independent Ceylon.

From the outset, the Department of Economics realised the need for improving the curriculum to given an indigenous bias and to give emphasis to an exhaustive study of the Ceylon Economy. But there were two impediments, the problem of staff and the availability of economic literature on Ceylon. The Department consisted of a Professor, a lecturer, and two assistant lecturers. The lecturer left within a year but the post was kept vacant. The Professor and one of the assistant lecturers were specialists in Monetary Economics and the other was a specialist in Economic

History. Statistics was taught by a Visiting Lecturer. Due to shortage of staff, Agricultural Economics and Commerce which were of vital importance to Ceylon, were hardly taught. The paucity of economic literature pertaining to the country prevented the teaching of applied economics within a local framework. Above all, official statistics were hardly available. Some members of the teaching staff of the Department of Economics, in the 1940s, carried out a number of topical studies on the Economy of Ceylon. Professor B.B. Das Gupta's "Some problems of Social security in Ceylon", "The exchange value of the Rupee"; "Ceylon's Sterling Balances"; "A short economic survey of Ceylon", and Mr. N.K. Sarkar's "Subjective cost of Financing Industrialisation" and "Agricultural Statistics of Ceylon", were some of the noteworthy studies aimed at giving Applied Economics a local twist.

By 1950, the numerical strength of the departmental staff increased to eight. But as far as specialisation was concerned there was hardly any qualitative improvement. Four out of the eight members of the staff were specialists in Monetary Economics, two in Political History, one in Statistics and the other in Economic History. Brought up in the Western tradition of economics these teachers contributed little to the indigenization of the discipline.

The course in Economics for the first examination in Arts in 1950, for example, included an elementary study of (a) Economics, descriptive and analytical including currency and banking, (b) English Economic History, with special reference to the period subsequent to 1760; and (c) Government, the work and organisation of modern governments with special reference to the British system. There was a total absence of any reference to Ceylon, its economy, economic history and government in this syllabus. The emphasis in the special course in Economics was largely on economic theory, economic organizations, and political thought and organizations based on Western experiences. In case of the syllabus for the special course in economics in the early fifties reproduced below shows that some emphasis was, however, placed in papers 2 and 4 on Ceylon. This emphasis on Ceylon though inadequate was made possible mainly because of economic literature produced by the University staff engaged in research surveys.

1. Economics - general theory

2. Economics - descriptive and applied including a study of

    (i) the forms and problems of modern economic organisation, and
    (ii) aspects of the economy of Britain and Ceylon

3. Principles and practice of Banking, Currency and International Trade
4. Modern Economic History including a study of the chief features of economic development in Europe, America and Ceylon
5. Economic Statistics
6. Political and Social Theory
7. An advanced and specialised study of one of the following:
    - (a) Economics, analytical and applied
    - (b) Banking and Currency
    - (c) Economic History
    - (d) Government
    - (e) Statistics
    - (f) Sociology

Micro and macro economics which deserved great emphasis in any specialised course in economics were hardly referred to in this syllabus. The approach to the discipline was more descriptive and analytical. In the absence of mathematics in the curriculum a quantitative approach was hardly possible. The teaching of statistics remained at an elementary level. The interrelationships between the general subjects and subjects of advanced and specialised study were hardly discernible and such a lack of interrelationship meant that the Department of Economics required a larger staff than was really necessary. In conclusion, the curriculum organisation in Economics apart from being unrelated to the needs of the country, demanded a large teaching staff specialised in narrow fields as in the highly developed universities in the West.

In the early fifties the University authorities, aware of the important role that economics has to play in emerging Ceylon, invited Sir Fredrick Rees to advise on the reorganisation of the Department of Economics, and his recommendations were primarily aimed at improving the quality of students offering Economics by regulating admissions to its general and special degree courses. On the curriculum, his view was that the London University model was hardly suited to local conditions and therefore needed revision. He suggested that the courses should be drawn up on the lines of a provincial university in England.[3] The University authorities, however, hardly took any positive steps in this direction at that time. The ensuing education explosion brought about by free education and the unavoidable switch over to national languages as the media of instructions in the University overshadowed all other issues.

4. Expansion of University Education and the Changing Status of Economics

Two major events in independent Ceylon caught the University in a state of total unpreparedness. The effects of free education introduced in 1945 and the change in the medium of instruction to national languages (grade by grade from 1953 to 1959) in the University were disastrous. University entrance classes, which were confined to a few English medium secondary schools increased in numbers with the change of the medium of instructions in schools. In 1942, thirty schools had presented candidates for the University Entrance Examination; 319 schools did so by 1960. Candidates appearing for the University Entrance Examination increased from 1,384 in 1947 to 2,289 in 1957, to 11,870 in 1962 and to a record high of 31,432 in 1966.[4]

Since 1956 the University of Ceylon was pressurised by the Government on two issues: increased intake of students, especially in Arts and Social Sciences; and the switch-over to national languages as the media of instructions. In effect, these were two facets of the same problem, because the students who were seeking admission in increasing numbers had been educated in Sinhalese and Tamil and expected to be taught in those languages at the University. The University, tied by the provisions of the Act that it was to be autonomous and residential was constrained by problems of accommodation etc. As for teaching in the vernacular languages, it was hardly possible to secure the services of teachers who were both academically qualified and competent in national languages to fill the gap at such short notice. The government regarded these problems as too urgent to await solutions through the University of Ceylon and decided instead to raise the Vidyodaya and Vidyalankara Pirivenas -- Centres of traditional Buddhist learning -- to the status of universities in 1958.[5] With their establishment in the following year the single campus system disappeared. The establishment of these two universities was scarcely a solution to the increasing number of Arts oriented students seeking admission from a large number of rural schools. By 1960 the pressure of numbers seeking admission to the University of Ceylon (each university conducted its own Entrance Examinations) became irresistible. The Government acting on the basis that a qualified applicant had a right to a university education virtually compelled the University to admit a large number of students to their Arts faculties in 1961, at least half of whom numbering over 600 were to be non-residential students. But the demand for University admissions continued to mount because a large number of qualified candidates were left out and most of them sought admission to the Arts oriented faculties. The relative strength of Arts oriented subjects, for example, at the General Certificate of Education Advanced Level Examination (G.C.E."A" Level) of 1966 could be seen from Table 6. Languages and Liberal Arts (Sinhala, Pali, Buddhist Civilisation, History, Geography, Government) ranked as the most popular subjects. As a further step a second teaching Unit consisting of the faculties of Arts and Oriental Studies was established, in Colombo. The numbers admitted to the Unit by 1966 had increased to almost to the level of the Arts Faculty at Peradeniya. Hence, a new University -- the University of Colombo -- was established in 1967.

TABLE 6

G.C.E.(Advanced Level) - 1966

Subject	No. Sat
1. Languages	23875
2. Liberal Arts	51637
3. Science	21711
	97223

(Source: Wijemanne, 1969:962).

Another measure taken to expand further the opportunities for higher education was to make provisions for the conduct of external examinations. The Vidyodaya and the Vidyalankara University Act of 1958 while allowing the granting of external degrees by the two universities also went a step further. These two universities were empowered by the Act to affiliate institutions. This gave an opportunity for a large number of teachers and others who had been educated in the Sinhala medium and, who were excluded from benefits of the facilities available at Peradeniya, to proceed with their higher studies. In 1961 the University of Ceylon followed suit and the Ordinance was amended so as to enable that University also to conduct external examinations. Although the amendment was intended mainly to accommodate the school-leavers, a large number of teachers and others were benefitted by this. Those affected by the abolition of London Degree Examinations in Ceylon were permitted to register for the external degree of the University of Ceylon.

The provision of such facilities between 1957 and 1966 were hardly adequate to match the rapidly growing demand for higher education from the mid sixties. The burgeoning increase for Arts based courses from 31,432 in 1966 to 72,474 in 1977, indicated the dire need for regulation and control of intake to universities. Faced with financial restrictions the Ministry of Education after 1970 followed a policy of containing facilities for higher education, effected a tight control over admission to the universities. The restrictive policy, affected the Arts and Social Science streams, but not the Science based courses.

Within a controlled University admissions policy which continued up to present times, the discipline of economics was singularly fortunate in ascending into greater heights among the social sciences. This was obviously due to the employment opportunities in the various sectors of the economy which placed a premium on a knowledge of economics.

The formal organisation on planning, the National Planning Council and the Planning secretariat set up in 1957 - brought out the Ten Year Plan of Economic Development. In the sixties that plan came to be implemented through short term programmes. As planning began to assume greater importance in the mid sixties a new Ministry of Planning and Economic Affairs was created in 1965. It had various divisions and among them was a special division for implementation and co-ordination. In 1973 the division on implementation was given the new status of the Ministry of Plan Implementation. Besides, in the seventies Regional Planning was given more emphasis. All these developments in planning involved research, economic surveys, project evaluation, data collection, implementation etc. What was more, these developments in planning created smaller planning units within various government departments both at the central and regional levels. The post-1960 period also saw a rapid growth in public corporations. Most of the corporations were set up with the twin aims of increasing industrial production and creating employment. Apart from corporations which produced services like the Ceylon Transport Board there were not more than 14 industrial corporations in the country in 1964 (Wijensighe, FDC, 1964:22). But by 1981 their number had increased to 85. The more phenomenal development, however, was in the banking sector. Commercial banking which was confined to the import-export trade and plantation agriculture in the earlier decades began to penetrate rapidly into other sectors, particularly, to the indigenous sectors the initiative being taken by the People's Bank set up in 1961.

In the seventies far reaching economic reforms such as the Land Reforms, the nationalisation of foreign owned plantations and the massive development projects like the Export Promotion Zone and the Accelerated Mahaveli Development Project created further avenues of employment for economists.

This trend promoted many Arts students to opt for courses in economics. At the end of the sixties the problem of teaching at secondary school level was eased as those who had read economics at the universities in the national languages had found teaching jobs in schools. The introduction of teaching economics at school level in the late sixties coupled with the better employment prospects for economists resulted in increase in the number of candidates for the subject at the G.C.E. (Advanced Level) Examinations. Table 7 shows that in the decade 1972-1982 while the number of candidates at the G.C.E."A" Level Examination had registered a decline of 1934 those of geography and commerce had shown an increase by 58,216 and 43,634 respectively. The increase in the number of candidates for economics, on the other hand, reached the amazing figure of 91,001 which is evidence of the fact that the discipline had emerged as the most popular subject among the Social Sciences at school level.

TABLE 7

Numerical distribution of candidates for G.C.E.(A.L.) Examination in History, Geography, Commerce and Economics, 1972-1982 for selected years.

Year	History	Geography	Commerce	Economics
1972	10,328	8,743	2,091	6,083
1978	9,584	27,001	15,081	38,192
1979	7,206	27,702	16,454	40,932
1980	10,280	65,909	50,786	92,042
1981	7,443	53,914	41,463	78,958
1982	8,394	66,959	45,725	97,084

(Source: Data Processing Branch, Ministry of Education, Sri Lanka).

At the universities, too, the comparatively better prospects of employment for graduates of economics inevitably led the discipline to receive better status among Arts oriented courses. The relative strength of economics in each university in the faculties of Arts in 1971 and 1981 is given in Table 8. The figures show that the total student enrolment for economics in all the universities in both years was more than 50% of the undergraduate registration in Arts faculties. In some universities -- Vidyalankara 1971 and Jaffna 1981 -- the percentage rose even above that level.

TABLE 8

Undergraduate enrolments in Economics 1971 and 1981

Name of Institution	Total undergraduate registration Arts Oriental Studies	Number enrolled for Economics	Total undergraduate registration in Arts Oriental Studies	Number enrolled for Economics
Colombo	2,057	1,082	2,190	810
Peradeniya	2,389	1,449	2,068	1,489
Kelaniya - (Vidyalankara) 1971	1,737	964	2,427	1,232
Sri Jayawardanapura - (Vidyodaya)	1,549	687	2,687	1,260
Jaffna	-	-	894	722
Ruhuna	-	-	894	226
TOTAL	7,732	4,182	10,671	5,739

(Source: 1971 University of Ceylon - Annual Report; 1981 *Annual Report of Universities*).

Table 8 shows that 5,739 of the 10,671 undergraduates enrolments in 1981 were in economics. But it represented only a small proportion of the total number of candidates eligible for university entry who were left out by the restrictive admissions policy. Such people offered economics by appearing as private candidates. Following table illustrates this trend as it relates to the University of Peradeniya.

TABLE 9

Number of candidates registered for
External Examinations 1978 - 1982

Year	Total number of candidates in Arts Oriental subjects	Economics
1978	5,237	4,236
1979	7,469	6,535
1980	6,408	5,122
1982	8,003	6,445

(Source: External Examinations Branch, University of Peradeniya).

The period of expansion in higher education was accompanied by some relatively significant developments in the economics curricula at Universities.

In the post-1960 period the need to give greater weightage to economic theory was realised. Further in the fifties, Keynesian and post-Keynesian theories and growth theories had gained importance in the economics curricula of universities elsewhere. These development influenced teaching of economic theory in our universities in the sixties. The result was that by the seventies economic theory came to be taught under three papers - Micro, Macro and Advanced Economic theory. The years following 1956 witnessed a progressive increase in the volume of economic literature on Ceylon. A number of Journals came into being which dealt widely with contemporary economic problems of the country. A considerable number of postgraduate theses in Economics which were published became standard texts on economics of the country. Besides the volume of research materials coming out from various research institutions was substantial. The availability of economic literature on Ceylon helped Applied Economics to develop not only into a separate course but also the course content to receive a strong Ceylon flavour. Greater emphasis for example, was placed on the structure of the Ceylon economy, population, foreign trade and balance of payments, agriculture and domestic agriculture. By the end of the sixties in most universities the subject of economic history which had been in the curricula since 1922 was replaced by comparative economic development in which sufficient stress was given to the economic development of the country in modern times. The proliferation of the discipline into various branches was another significant feature in the curriculum development of the post-1960 period. In this period of multi-university system the disadvantages of duplication and triplication of specialised field of study in economics became obvious.

The newer universities, Vidyalankara, Vidyodaya and Colombo in the sixties became innovative in the development of new courses, for specialisation partly to make their contribution to the development of the discipline marked and partly to the competition they encountered as new universities. In addition to providing specialised courses such as monetary economics, statistics and accounting which the University of Ceylon had introduced earlier, the Vidyalankara University in the late sixties introduced new courses of specialisation such as industrial economics, estates management, and transport economics. The early seventies saw the initiation of job-oriented courses in universities. For example, the need for undergraduate courses in valuation and taxation was stated by the Minister of Finance in his budget speech of 1971. Consequently, in 1972 two new courses, estate management and valuation were started at the University of Colombo. A new course consisting of some fifteen job ranges was started in Colombo under a new programme of "Development Studies". The job ranges were assigned to the Departments of economics, history, geography and mathematics. Those assigned to the Departments of economics and geography were ones that had an economics bias and are reproduced below.

Economics : Job ranges
Population and Manpower
Planning
Development Planning & Administration
Banking, Insurance & Finance
Trade and Commerce

Geography : Industry and Forestry
Transport and Communication
Tourism and Recreation

The syllabi for these courses were prepared with the assistance of personnel employed in the various fields in which the students following these courses were expected to seek employment. At the beginning the courses in estate management and valuation alone admitted 186 students in 1972. However, in a few years there arose serious problems in the conducting of these courses. The members of the Faculty (Geography, Economics & History) could not handle in addition to their normal duties several of the new courses in Development. The Faculty was therefore, overdependent on visiting lecturers drawn from government departments which necessitated teaching after 4.30 p.m. on week days and on Saturday mornings. The specialisations of some members of the permanent staff were unrelated to these courses and the necessity to re-orient them to these courses became clear. Besides, as large numbers passed out after following these courses the demand for such courses of study declined and by mid-seventies employment prospects turned out to be bleak.[6] Consequently, such job-oriented courses had to be abandoned in the late seventies. Thereafter, two theory oriented courses that could be competently handled by the University teaching staff Estate Management and Public Finance have been introduced into Economics Curricula in their place. Moreover, the study of international trade which comprised a sub-section of either Macro Economics or Monetary Economics developed into a separate subject towards the end of the seventies.

Although economics had gained popularity in the school curriculum the approach continued to be basically descriptive. The lack of knowledge of mathematics is a handicap to students learning economics so as to give the subject its quantitative perspectives. It is unfortunate that at school level brighter students take the science stream while the left overs go in for Arts stream. The universities have long realised the value of giving greater importance to quantitative methods in the economics curricula, although it is an uphill task to teach mathematics to students lacking even a basic knowledge of mathematics. This is perhaps the greatest concern of all departments of economics in Sri Lanka. Every department provides courses in mathematics and the brighter students are selected to follow specialised courses like advanced statistics. In such courses of study econometrics was made an important part.

With the general improvement in the knowledge of mathematics of students following special courses in economics, in some universities econometrics is now taught as a separate subject. What is more, as a further step, a separate paper called Quantitative Methods is also being introduced practically in every university.

The universities in this country are also aware of the relevance of mathematical economics in the Economics Curriculum. In fact, some universities have prepared blue prints for the teaching of this subject. But there are some problems of implementation. The knowledge of mathematics of students is not sufficiently high, to follow the subject and there is also the difficulty of getting qualified teachers in the subject.

In recent times the value of data processing machines and computers for the study of economics has been realised by the universities in Sri Lanka. Arrangements are being made by the Ministry of Higher Education, Sri Lanka, to provide the universities with mini-computers and in a few years time there is the possibility of economics departments to use computers for the study of economics.

In the meantime, in departments of economics where there are students specialising in advanced statistics, the subject of computer programming, is being introduced. This course covers data processing, an introduction to Computer Programming, operations research, and application of statistical methods in selected fields. Computation techniques; numerical mathematics; the use of calculators and the use of computers in large scale surveys are given emphasis. Other topics dealt with are: linear programming, transportation problem; assignment problem; and critical path analysis.

Throughout the history of university education in Sri Lanka economics had been taught by the people who had their post-graduate training mostly in Western universities. Only in very recent times when the universities ceased to finance post-graduate education abroad, that a few members of staff went to the universities in Japan on scholarships to follow post-graduate courses in this field of study. The famed Delhi School of Economics unfortunately was never an attraction for Sri Lankan post-graduate students. Consequently, in teaching as well as in research dominance of Western economic theory and methodology has become a characteristic feature in Sri Lanka.

II. Infrastructure for Teaching and Research in Economics

a) Teaching

Economics was introduced as a subject in the school curriculum at the G.C.E. (Advanced Level) in the late sixties. As a university discipline, economics was given independent status in 1942 with a separate Department of economics within the Faculty of Arts.

As a result of the country-wide educational reforms of the mid-forties the number of students seeking admission to the University of Ceylon swelled. It was predominantly a demand for the Liberal Arts and Oriental Studies. The ancient seats of traditional learning were made universities in 1959 -- Vidyalankara and Vidyodaya Universities of Ceylon -- within five kilometers of the metropolis. They were mainly for Arts subjects, and helped ease the pressure on the single university. A second unit of the Arts and Oriental faculties of the University of Ceylon set up in

1963 in Colombo eased the pressure further. This seat of learning became a separate University of Colombo in 1967. With the introduction of the University of Sri Lanka Act (No. 1 of 1972) the four scattered universities and a technical institute known as the Katubedda Technical College located some ten kilometers south of Colombo were converted to five campuses under the University of Sri Lanka. In 1974 yet another campus of this single university was established in the northern peninsula of Jaffna. All six campuses except that at Katubedde were Arts oriented. Under a new Universities Act, No. 16 of 1978 a University Grants Commission (U.G.C.) was established and University status was restored to the six campuses. Thus in 1978, six universities namely those of Peradeniya, Colombo, Jaffna, Kelaniya, Sri Jayawardhanapura, and Katubedde came into being. In 1979, the Ruhunu University College in the South under a Director, and the Dumbara Campus affiliated to the University of Peradeniya were established. Two years later was born the Batticaloa University College in the East Coast of Sri Lanka. All these institutions of higher studies, except at Katubedda University and the Batticalcoa University College, were Arts dominated while the leading subject within the Arts in all the institutions was economics.

1. Department of Economics, Peradeniya

First started in 1942 it is the oldest among the departments of economics in Sri Lanka. In course of time the department has expanded by bringing in other allied disciplines like Commerce and Statistics under its charge. It is the largest of the departments constituting the Faculty of Arts. The courses in economics at the Dumbara Campus are also taught by the staff of this department.

There are 24 members on the staff of this department, as shown below:

Professor	1
Associate Professor	0
Senior Lecturer	5
Lecturer	3
Probationary Assistant Lecturer	10
Visiting Lecturers	5
Total	24

The total student enrolment for economics in the academic year 1981-82 was 1,489 which is disaggregated below according to the distribution among different courses of study:

Course		Number enrolled
First Examination in Arts	-	640
General Arts Degree Part I	-	287
General Arts Degree Part II	-	360
Special Arts Qualifying	-	41
Special Arts Degree Part I	-	54
Special Arts Degree Part II	-	107
Total		1,489

In spite of the dearth of lecturers with post-graduate qualifications the department has undertaken a programme of revision and improvement of the courses of study. Already an introductory course in Computer Programming has been introduced with the assistance of the Mathematics Department. Besides, the economics curriculum is improved with an idea of giving a substantial bias on economic theory. Subjects such as international economics, economic analysis and problems, and quantitative techniques are being introduced in addition to micro economics, and macro economics. The syllabi on monetary economics and statistics, which were the traditional specialisations in the department of economics have not only been updated but other specialities like labour economics, comparative economic development, agricultural economics, transport economics and rural development have also been introduced. But some of these specialities had to be suspended till competent lecturers to teach them were available. Similarly, the dearth of competent lecturers to supervise post-graduate students retarded the development of graduate studies. As a stop-gap measure some of the long standing probationary assistants were made to join the M.Sc. Agricultural Economics Course at the Post-graduate Institute of Agriculture.

2. Department of Economics, Colombo University

In 1967, when the University of Colombo was established, a few members of the department of economics at Peradeniya opted to join the new University. From then onwards, with new appointments, mostly at the assistant lecturers level, the staff position gradually improved. By 1972 the teaching staff numbering nineteen consisted of one professor, one senior lecturer, two lecturers, twelve probationary assistant lecturers and three temporary assistant lecturers. Due to large student population and the introduction of job-oriented courses, as referred to earlier, the full time staff was supplemented by 28 visiting lecturers. From early 1970s the department of economics, has been conducting a number of job-oriented courses of study such as Public Finance and Taxation; Estate Management and Valuation and Development Studies. In the late seventies the discipline of Commerce was also added to the departments' courses of study. The job-oriented courses had to be given up eventually for a variety of reasons. As enrolments for Commerce Courses began to increase the University decided to set up a separate department of commerce. At the same time, it was decided that the teaching of political science should also be separated from the department of economics. This happened in 1981.

The department functions under the Faculty of Arts. Including the professor who is also the head of the department the staff strength at present totals up to eighteen, as shown below:

Professor	1
Senior Lecturer	2
Lecturer	1
Probationary Assistant Lecturer	12
Temporary Assistant Lecturer	2

In this department, too, the presence of a large number of assistant lecturers is well marked. Out of a staff of eighteen not more than four are with post-graduate training and only five out of the twelve probationary assistant lecturers have managed to go abroad to obtain such training. Therefore the department obtains the services of 4 visiting lecturers for some of the subjects to teach the special courses in economics such as advanced statistics, monetary economics, and development economics.

The total student enrolment for economics in the academic year 1982-83 was 810 and the distribution among courses is as follows:

First in Arts	368
General Arts Degree Part I	190
General Arts Degree Part II	132
Special Arts Degree Part I	33

Special Arts Degree Part II	41
Special Arts Degree Part III	46
Total	810

3. Department of Economics, Sri Jayawardhanapura

As elsewhere, the department of economics at Sri Jayawardhanapura (formerly Vidyodaya) University is under the Faculty of Arts. In the early sixties, the University followed the same courses as the University of Ceylon. Later, with the increase in the number of students and with the increase in the number of institutions with courses in economics this University made efforts to deviate from the traditional courses of study, like, for instance, the introduction of courses in business administration and public administration. Through such efforts, the department of economics of that University was able to attract comparatively larger number of students. In the academic year 1971-72 for instance, the student enrolment for the various courses (economics, public and business administration) was over one thousand. Moreover, courses in business and public administration with a very high component of economics not only gained popularity among public servants but were also considered useful by the government. Consequently, the rationalisation scheme effected by the government under the monolithic single university system in 1972, the department of economics of that University was spared of losing the courses of study it had been conducting from the inception. What was more, under the same scheme, a Faculty of Economics, Commerce and Managements studies was created in that University. The great impetus given by the creation of a separate faculty for these courses resulted in a steady progress in strengthening the staff position, expansion in student enrolment for economics and the development of the curricula. In 1972, the strength of the economics teaching staff was twelve of which 10 were probationary assistant lecturers and two were lecturers (grade II). In addition, there were three visiting lecturers. For management studies the number of the full-time staff was same as that of economics, but it included a professor and seven lecturers (grade II). The visiting staff for those courses of studies was sixteen. Since 1972, the staff position for economics had improved both in numbers and in quality. The current position of the staff as stated below shows that it has not only increased to eighteen but is also the only department of economics in Sri Lanka with the least dependency on assistant lecturers for teaching work.

Professor	1
Senior Lecturer	5
Lecturer	7
Probationary Assistant Lecturer	4
Instructor (Mathematics)	1
Total	18

The distribution of the teaching staff with post-graduate qualifications as given below also shows that the department has a competent teaching staff to conduct the Special Degree Courses in economics without the need for specialists from outside.

Development Economics	5
Agricultural Economics	3
Demography	1
Econometrics	1
Statistics	2
Economic History	1

There seems to be no basic difference in the syllabus for First in Arts and the General Arts Degree Examinations from those followed in other universities. In the case of Honours Courses in Economics conducted by this University, there are, however, some significant differences. An examination of the course structure for the Bachelor of Economics (Special) Degree Programme shows that in the first place, there is an element of multi-disciplinary approach in teaching of economics by the introduction of subjects such as economic geography, sociology, English, and political and social theory. Secondly, there is also a greater emphasis on economic theory and quantitative methods.

4. Department of Economics, Kelaniya

Until 1964 the courses provided in the department of economics of this University were for the First in Arts and General Arts Degree Examinations only. This was due largely to the limitations imposed by the dearth of competent teachers to teach economics in Sinhala. With the slight improvement in the staff position in 1963 a special course in monetary economics was introduced. Until the late sixties the General Degree Course and the Special Degree Programme with monetary economics as the only speciality remained unchanged and the curricula for the courses were the same as in the Economics Degree Courses in the University of Peradeniya

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and Colombo. In 1969 a departure from the traditional type of special areas of study was made by introducing new specialities such as estate management and industrial economics. This was followed in 1972 by introducing another speciality, "transport economics". The three new specialities combined both theory and practical work and the latter demanded the services of a large visiting staff who were professionally qualified. The good progress made in the teaching of these special courses of study was hampered with the rationalisation of academic disciplines proposed in the University Act of 1972. According to the rationalisation to be effected the University of Kelaniya (then Vidyalankara) was to be a centre of excellence for humanities, languages and fine arts and the discipline of economics was confined to General Degree Courses. The proposals were never implemented but the future of the discipline in the University was in a state of uncertainty and consequently it affected the recruitment and training of staff and the development of the economics curricula. Once the uncertainty regarding the future of the economics courses was removed by the Universities Act of 1978, the discipline began to make steady progress. The department of economics was brought under the Faculty of Social Sciences and the teaching staff strength improved from 11 in 1972 to 21 in 1982. But as shown below a heavy load of teaching work is being carried out by assistant lecturers. In the absence of a professor the academic administration of the department is being carried out by the one and the only senior lecturer.

Professor	-
Associate Professor	-
Senior Lecturer	1
Lecturer	2
Assistant Lecturer	16
Temporary Assistant Lecturer	2
Total	21

However, in a year or two the department can expect to have a better qualified teaching staff. Out of the sixteen assistant lecturers five are abroad on study leave. Of the remaining eleven, five are following post-graduate studies locally.

With an undergraduate enrolment of 1332 the economics department is the largest in the Faculty of Social Sciences of this University. Because of the variety of specialities -- monetary economics, statistics, agricultural economics, estate management, industrial economics, transport economics and accounting -- a comparatively larger number of students follow Honours Courses in Economics. The distribution of students following various courses in economics is given below:

First in Arts Examination	358
General Arts Degree Examination Part I	326
General Arts Degree Examination Part II	402
Special Arts Degree Examination Part I	83
Special Arts Degree Examination Part II	97
Special Arts Degree Examination Part III	66
Total	1,332

There is a great deal of similarity in the course structure and contents of curricula followed in the First in Arts and the General Arts Degree Examinations with those of other universities. In the case of the Honours courses efforts are being made in the direction of giving more weightage to economic theory and quantitative methods. In the case of specialities -- the teaching of estate management, transport economics and industrial economics -- both theory and practical side are combined. To give the practical knowledge of these specialities the services of professionals are procured in the capacity of visiting lecturers.

5. Department of Economics, Jaffna

The department of economics of the Jaffna University, although of recent origin (1974), has recorded a faster student enrolment mainly because of the fact that it is the only department where the subject is taught solely in Tamil. In 1976, 183 students were enrolled to read economics for First in Arts, General Arts Degree and Special Arts Degree Examinations and the teaching staff consisted of 9. Between 1976 and 1982 there was exactly a threefold increase in the academic staff. However, as can be expected in a new department that increase was largely due to the recruitment at the assistant lecturer level which can be seen from the classification of the staff given below.

Professor	-
Associate Professor	-
Senior Lecturer	2
Lecturer	2
Assistant Lecturer	12

Temporary Assistant Lecturer	6
Visiting Lecturer	5
Total	27

The department comes under the Faculty of Arts and a senior lecturer functions as the Head of the department. There are only four on the permanent staff with post-graduate qualifications.

The number of students enrolled for economics has increased to 975 in 1982 from a mere 183 in 1976, and as shown below, the largest number of students registered was for the Special Degree Examination in Economics.

First in Arts	350
General Arts Degree Examinations	220
Special Degree Examinations	375
Total	975

One can hardly expect a department with a very recent origin and also with a staff constituted mostly by juniors to be up-to-date in curriculum development. As can be naturally expected the teaching curriculum is modelled on what is in the University of Peradeniya. The subjects of specialisation for the Honours Degree are monetary economics and sociology.

6. Department of Economics, Ruhuna

The Ruhuna University College was established in 1979. Like in other universities, at this institution too, the discipline of economics has emerged as the most popular of the Arts oriented subjects. As stated in the administration report for 1981 more than 85% of the students in the Faculty of Arts were concentrated in the department of economics. The student enrolment for economics in the year 1982-83 is 435 and its distribution according to the courses is as follows:

First in Arts	125
General Degree Course	300
Special Degree Course	10
Total	435

The specialities in the Honours Courses are limited to two, namely monetary economics and statistics. Like in Jaffna, here too there is no novelty about the course structure and the contents. They are almost similar to the courses at the University of Peradeniya. Nor can one expect curriculum development and an increase in the number of courses to take place in the near future in view of the weak staff position. The academic staff, including the Professor, consists of ten of whom six are assistant lecturers and three are temporary assistant lecturers. There are four with post-graduate qualifications and they have specialised in four different areas, namely monetary economics, statistics, agricultural economics and management studies.

b) Graduate Studies in Economics

With insufficient staff to teach the undergraduate courses, the six departments of economics are ill-equipped to undertake graduate programmes on a full time basis. The demand for graduate courses, too, is restricted in view of the compelling circumstances that drive promising students in search of jobs. The lack of research grants, the nonavailability of senior dons to direct and supervise research add to the complexity of the problem. Registration for graduate studies is thus invariably on a part-time basis and in no department does the number of graduate students exceed ten per year, the majority of them being probationary assistant lecturers who have failed to secure placements abroad. Such registrations are for Master's Degree, often by both course work and research. The duration of such courses is a maximum of three years and the work may be supervised by a senior don.

The Post-graduate Institute of Agriculture, set up in 1975, provides both full and part-time courses in Agricultural Economics under a three fold programme leading to M.Sc., M.Phil. and Ph.D. in agricultural economics and extension. A Board of Studies prescribes the course combinations for the M.Sc. as well as the combined course and research programme for the M.Phil. and Ph.D. The Institute has its own staff of a professor, two lecturers and nine assistant lecturers, four of whom possess post-graduate qualifications. Services of dons from the department of agriculture and economics supplement the teaching and the supervisory services of the Institute.

The student body is drawn from two sources - those nominated by government institutions and those selected by the Board of Studies. In the academic year 1981-82 the M.Sc. course had five students and the M.Phil. ten, of whom seven were on a full-time basis.

c) Research

Engrossed in the daily routine of teaching, often to large classroom audiences, university teachers in all departments of economics could hardly engage themselves in research. The little that is being done is in addition to their heavy load of teaching. The meagre funds available for research, often consisting less than one per cent of the annual recurrent budget need by shared among some thirty departments of study in each university. Nevertheless, there is a fair amount of on-going research funded by foreign agencies like the ILO, Kunrad Adeneur Foundation, the University of Oslo and the ESCAP.

Despite the numerous constraints outlined above the universities do publish journals incorporating the research output of university economists. The *University of Ceylon Review* started in 1943 paved the way for the *Modern Ceylon Studies* and the *Sri Lanka Journal of the Humanities*. The *Journal of the Vidyalankara University of Ceylon* was started in 1972; in 1982 its place was taken by *Kalyani: Journal of Humanities and Social Sciences of the University of Kelaniya. The Journal of Arts and Science and Letters* is a publication of the University of Sri Jayawardhanapura. Apart from these, individual academics have brought out several journals, the most noteworthy being a biannual entitled *Ceylon Journal of Historical and Social Studies*. The economics societies of both Peradeniya and Sri Jayawardhanapura universities also have their annual publications for which both undergraduate and staff members contribute articles.

1) Central Bank of Ceylon

From its inception in 1950 it was the one single institution with the largest concentration of economists in Sri Lanka. Its Economic Research Department set up in pursuance of its declared objective of ensuring within limits of monetary action full employment of the economic resources of the country. The main function of the department of economic research was to prepare data and carry out economic researches to guide the Monetary Board.

The Central Bank of Ceylon employs the largest number of senior economists -- nearly 150 -- in its various departments. Economic surveys and research are conducted by the Economic Research Department with a staff strength of forty-two. It is placed under a Director of Economic Research with four Deputy Directors to assist him. The department has seven main research divisions organised as follows:

Name of the Division	Number of Senior Economist	No. of Economists	Total
International Finance	2	2	4
Trade	1	3	4
Public Finance	1	5	6
Money & Banking	2	7	9
Agriculture	2	3	5
Industry	2	2	4
Economic & Social	1	4	5
Total	11	26	37

The results of research into various aspects of the economy are published monthly in three languages -- Sinhala, English and Tamil -- in the *Bulletin*, complete with statistical appendices and charts. In addition, the Bank brings out the *Annual Report* containing the review of the economy of Sri Lanka. Since 1975 the *Annual Report* was either accompanied or followed by the *Review of the Economy*, giving a detailed analysis of economic trends and developments in Sri Lanka. Macro researches also appear in the *Research series* as well as in the biannual *staff studies*.

2) Research Division of the People's Bank

The Research Division of the People's Bank, established in November 1974, conducts both short-term research which is concerned with the analysis of specific bank credit programmes, and long-term research on priority areas in terms of national economic development. In a comparative sense, the bulk of the research material produced by the Research Division falls into the category of micro-studies. Apart from the research papers produced as monographs, the Division also publishes a very useful monthly title the *Economic Review* in Sinhala, Tamil and English. A content analysis of the important monographs and some of the *Economic Review* articles is made later in this paper. But it is important to mention here that the declared objective of the *Economic Review* is to promote knowledge and interest in the economy of Sri Lanka and the economic development process by a many sided presentation of views and reportage facts and debate. The Research Division, unlike the department of economic research of the Central Bank of Ceylon, involves in its work economists and other social scientists from the universities and other institutions. The Division has a staff of 12, consisting of a director, senior research officers

(3), research officers (5), and research assistants (3).

3. Department of Census and Statistics

The department of census and statistics, one of the oldest government departments in Sri Lanka dating back to the second half of the nineteenth century had been performing a useful service to the academics, administrators, politicians and the general public in providing statistical data on various aspects of the country's economic and other resources. Apart from the *Decennial Census* of population published since 1871 the department also publishes the *Sri Lanka Yearbook* and *Annual Statistical Abstracts* of population and demographic data, labour and employment, agricultural production and land use, forestry, fisheries, industrial products, buildings, power, transport and communications, public finance, banking and insurance business institutions etc. The work is carried out by some forty officers including a few qualified in statistics; however, not all of the officers have specialisation in economics.

4. Ministry of Plan Implementation

Although the planning process in Sri Lanka commenced immediately after independence there was no machinery to see the proper implementation of the plans. Consequently, that responsibility was held by the General Treasury until 1957 when the National Planning Council and the Planning Secretariat were established. In 1965 a new Ministry of Planning and Economic Affairs was created. Among other divisions, this Ministry had a division of Plan Implementation. In 1973, a separate Ministry of Plan Implementation came into being.

After 1977, planning organisation went through further changes in the country. The Ministry of Planning was abolished and the Planning functions were transferred to the Ministry of Finance and Planning. The responsibility for monitoring and evaluation was, however, left with the Ministry of Plan Implementation which was also given other responsibilities including Regional Planning (see Ambalavanar, n.d.:1-2). For the purpose of this report the most important is the Ministry of Plan Implementation since the implementation of Planning in the country is based on its action-oriented research programmes.

The Ministry of Plan Implementation consists of the following Divisions:

1. Manpower Planning Division
2. Women's Bureau Division
3. Progress Control Division
4. Population Division
5. Population Information Division
6. Food and Nutrition Policy Planning Division
7. Regional Development Division
8. Children's Secretariat Division.

It must be said that the Ministry of Plan Implementation is not staffed exclusively by economists.

5. Agrarian Research and Training Institute

The Agrarian Research and Training Institute (ARTI), sponsored by the Government of Sri Lanka in association with FAO/UNDP was established in February 1972 as a Statutory body. It is an autonomous body which functions under the Ministry of Agriculture and Lands and is administered by a Board of Governors.

The functions and objectives of the Institute are (i) undertaking, fostering and co-ordinating research on agrarian structure, (ii) examination of the institutional factors basic to the development of agriculture, and (iii) training of personnel who are concerned directly or indirectly with ongoing programmes of agricultural development and agrarian reorganisation. It also serves as a centre of information relating to agrarian development and agrarian reforms.

Between 1972 and 1982 ARTI has published 44 papers under *Research Studies Series* and 20 under *Occasional Publications*. These research studies fall into a number of disciplines covering almost the entire agrarian sector. Including the Director of the Institute there are 31 officers at the Institute.

6. Marga Institute

The Marga Institute is a private, multi-disciplinary research organisation which has been registered under the Companies Act as an autonomous, non-profit making organisation. Its main activity is critical, non-partisan study of development issues in Sri Lanka and the Asian region and the publication of its research, which could be of value to policy-makers as well as to scholars and research institutions both within the island and abroad.

The establishment of the Institute in April 1972 was the culmination of many discussions among a small group of persons over a number of years, beginning in the early sixties. The group intended, "in time to widen the scope of its activities by making it the base for a centre of development studies. Such a centre could function as an autonomous institution and organise a programme of applied socio-economic research and study on Ceylon's problems."[7]

The structure and organisation of the Institute into its current nine divisions was determined gradually by the nature of the work undertaken and the multi-disciplinary character of the research that is carried out. The structuring of the Institute into operational divisions was a later development. Initially, the Institute functioned with a small core staff of consultants and researchers. But as its work increased it became necessary around 1975 to set up a Division of Rural and Urban Studies under a consultant. However, each constituent unit had its own head. The rest of the Institute functioned as a general entity with its day-to-day research being supervised by a Director of Studies. It was in 1977 that the Institute was structured into several Divisions and it continues to function in much the same form. Its current Divisions and the staff strength of each Division are as follows:

Name of Division	Staff
1. Micro-Level Socio-Economic Studies Division	19
2. Social Development and Human Resources Studies Division	16
3. Law and Development Studies Division	3
4. Science and Technology Studies Division	9
5. International Studies Division	12
6. Macro-Economic Studies Division	5
7. Implementation Projects and Studies Division	15

The Institute's publications in English fall into three categories:

(i) Research studies by its on staff or by scholars commissioned by the Institute. These include printed monographs published by the Institute as well as those prepared by it for other research or development organisations and published by them.

(ii) Papers prepared by the Marga staff, articles in the *Marga Journal* and papers commissioned by the Institute.

(iii) Papers and Reports written in connection with National/Regional/International Seminars organised by the Institute or in which the members of the staff have participated.

The *Marga Journal* published quarterly is devoted to the discussion of issues of development pertaining to developing countries in general, and to Sri Lanka's society in particular.

III. Major Trends in Research

The economic literature on the British period of Ceylon history (1798-1948) though voluminous, focuses itself on some selected aspects of plantation agriculture. Certain sectors of the economy such as foreign trade, and rural agriculture received scant attention of writers. The bulk of the economic literature written during that period was either by the planting and commercial community or by the civil servants; much of it was descriptive.

The period following independence (1948) introduced marked change in the economic writings on Sri Lanka. Not only was there a substantial volume of articles, monographs etc. written by trained economists -- both local and foreign -- but the coverage was also diverse. Because of the new thrust on economic development of the country, policy oriented or action oriented research received greater emphasis.

1. Research Publications

The first major attempt to understand the economy of the island in scientific terms was made by Sir Ivor Jennings who wrote *The Economy of Ceylon* in the early 1940s. This book provided a useful text for the understanding of the economic structure of the country. While analysing the structure of the country's economy it also discussed the way in which the people of the island had their needs met through the economic system. The most important contribution of the author in this work was the highlighting for the first time of the prevalence of large scale underemployment in rural areas.

The fifties and the sixties added a considerable number of books of high quality to the economic literature on the country. The majority of them were theses written by scholars attached to the University of Ceylon and the Central Bank of Ceylon. Most of these were macro studies and covered at least the more important sectors of the economy. Some of these publications are used as authoritative texts in the study of such subjects as applied economics, economic history of Ceylon of the modern period, money and banking in Ceylon, and the Demography of Ceylon. A brief review of some of the major works is provided here.

The *Disintegrating Village*, (Sarkar and Tambiah, 1957), was a result of a socio-economic survey conducted in Pata Drumbara village jointly by the departments of economics and sociology of the University of Ceylon. The research focussed on the problems of land tenure, fragmentation of land holdings, indebtedness, and the influence of such factors on the low production of paddy in that area. Being one of the first inter-disciplinary surveys, the work was a valuable supplement to the findings of the rural economic surveys conducted by the department of economics of the University of Ceylon under the guidance of Professor B.B. Das Gupta.

Agricultural credit had always been considered a vital factor in the economic development of an agrarian economy but it was not until the fifties that the subject received the attention of local scholars. The problem, of course, had been discussed by foreign scholars since the turn of this century but the emphasis had been on the supply side while the demand side of the problem was hardly looked into. Moreover, the question has not been looked at from an economist's point of view. '*Agricultural Credit in a Developing Economy - Ceylon*' (Tilakaratne, 1963), attempted to look at the problem from both the demand and supply sides. The study also attempted to state the credit problems of small farmers.

No sector of the country's economy has been as comprehensively covered as that of money and banking. In fact, this sector had drawn the attention of scholars since the 19th century. *Notes on the monetary system of Ceylon* (Stuart, 1855), *Ceylon Coins and Currency* (Codrington, 1924), *Ceylon Currency, British Period* (Fernando, 1939), and *Ceylon Currency and Banking* (Shenoy, 1941) represent some of the pioneering studies. These works, however, were more informative than analytical.

From Dependent Currency to Central Banking in Ceylon (Gunasekara, 1961) was substantially based on a thesis submitted to the University of London for the Ph.D. degree. This work examines the evolution and the behaviour of the currency and banking system of Ceylon from 1825 to 1957 against the background of its economic development. Consequently, it has resulted in the narrative of monetary events and an analysis of their effects on the economic system. In the course of that analysis the author has drawn his attention to the following issues: the adequacy of monetary institutions, the doctrines and opinions which were responsible for such institutional arrangements, the role of the banks, the factors influencing the supply of money and credit. Besides, the influence of monetary factor on economic fluctuations and on economic development and the significance of central banking have also been adequately dealt with. This work covered comprehensively the monetary problems of a colonial export economy in the process of development and change. It successfully combined economic theory with economic history.

The Central Bank was established in 1950 and an analysis of Central Bank experience could not be made by Gunasekara due to the short period of its existence. Besides, operations of a significant number of specialised financial institutions such as the Ceylon Savings Bank, the Post-Office Savings Bank, the State Mortgage Bank, Insurance Houses, Hire-purchase and Finance Companies and the Development Finance Corporation did not come within the purview of Gunasekara's study. Above all, the post-1957 period witnessed significant changes in the spheres of commercial banking activities of financial institutions and credit policy which lay outside the scope of Gunasekara's study. The void thus created was filled by Karunatilake's publication in 1968. The author has analysed powers, functions and activities of the banking and financial institutions in the island with valuable statistical data pertaining to their operations. It is an interesting analytical and exhaustive study of the development of banking and financial institutions. The operation and the background leading to the establishment of State banks, rural banks, and the government entering insurance business are also adequately dealt with in this study. The final part of the book has been devoted to an analysis of the operations of the Central Bank in which an evaluation of its role in the economic development of independent Sri Lanka is discussed.

Another sector of the economy which had been adequately dealt with by local scholars is foreign trade in Sri Lanka. The two works based on post-graduate theses of W. Rasputram (1964) and Elaine Gunawardhana (1965) are the outstanding works. Gunawardhana's study is an analysis of the economic fluctuations that occurred in Sri Lanka during the nineteenth and twentieth centuries. In the course of that analysis the far reaching changes that took place in the structure of the economy -- the transformation from a subsistence to an agricultural export economy -- are discussed. Throughout the period under survey Sri Lanka's economy was linked with that of Britain; the study, attempts to explore the nature of this dependence particularly in the area of economic fluctuations. Besides, an inquiry is also being made to determine to what extent the trade fluctuations were peculiar to an agro-export economy. For the first time a critical analysis of the international commodity regulations up to the end of the Second World War was made in this book. Special mention, however, should be made about the section of the cyclical movements in exports, explained in terms of the Cobweb Theorem. The book comprises of fifty statistical tables and fifteen charts which are invaluable to students interested in the study of the structure of the Sri Lankan economy.

Rasaputram's study treats foreign trade as the primary factor in the economic growth of this country. Starting with a description of the chief features of the country's economy the book goes on to present data on the degree of specialisation, direction and the composition of trade, instability of export income and the growth of trade and incomes. While an attempt was made to explain the causes of instability, the effectiveness of some of the measures taken to stabilise export incomes in the country is also given. It is shown that the terms of trade plays a vital role in the economic growth of the country. Besides, an attempt has also been made to measure the demand for exports, and on that basis to project the future growth of trade and income. Since imports are also an important part of the country's foreign trade a section of the book is devoted to an analysis of the demand for imports.

The main focus of the works cited above was on certain chosen topics of study but the overall analysis was against the background of a primary producer export economy. Consequently, the development of the plantation sector has received considerable attention of these scholars. The fluctuating fortunes of the coffee, tea, rubber and coconut industries up to the World War II, for example, were discussed by Gunasekara in the course of discussing the vicissitudes of the Ceylon Rupee in the period under his survey. Similarly, Gunawardhana has given sufficient attention to tea, rubber and coconut products in the examination of business cycles exhibited by the export of these commodities in the period 1900 to 1955.

In addition there were specialised studies on the plantations which were published in the 1960s. N. Ramachandran's (1968) work, while tracing the growth of plantation crops, gives special attention to foreign investments in tea and rubber. Published in the late sixties was another work of great importance based largely on the plantation sector. *Ceylon: export economy in transition* by the American author Snodgrass (1960). This work not only supplements information given in other works on the plantation sector but also serves as a valuable reference work on the economic history of Sri Lanka in modern times.

The early fifties reflected a strong interest in the West Keynesian economies and on the role of fiscal policy as an instrument for stabilising the economy. It was widely believed then that the problems of acute depression and massive unemployment such as occurred in the West need no longer recur because of the solutions offered by the 'New Economics'. It was natural, therefore, to question whether the same approaches and conclusions were applicable to developing countries like Sri Lanka subject to cyclical instability. This was a central issue in Gamini Corea's work, *The Instability of An Export Economy* published in 1975.

A sector of Sri Lanka's economy that suffers from a dearth of published materials is transportation. B.F. Perera's *History of the Railways* (n.d.) traces the development of rail transport in this country in the period of the development of plantations. However, it is descriptive and does not provide any economic analysis of railway expansion in Sri Lanka. The other is on the *Port of Colombo* (Dharmasena, 1981). In this study it is shown how with the expansion of the British Empire and the growth in international trade the Port of Colombo became commercially and strategically important. The circular causation of increasing trade leading to more shipping and more shipping to more trade is brought out in this book.

Due to high cost of printing the number of publications on Sri Lanka diminished sharply after 1970. Of the few books on economics written on Sri Lanka after that year two are worthy of being cited. One is by Dudley Seers (1971) of the University of Sussex. The other is by Mallory Wijesinghe (1976), the President, Federation of Chambers of Commerce and Industry.

By the early seventies unemployment had become chronic in every developing country. As a result, the International Labour Organisation (ILO) initiated the World Employment Programme. As part of the Programme, pilot missions were sent to different countries to investigate the local causes of unemployment, and to recommend action international and national. Sri Lanka was selected for the first pilot project in Asia.

The mission report titled, *Matching Employment Opportunities and Expectations*, was prepared by an international team of experts led by Dudley Seers. It first analysed and assessed the unemployment problem drawing particular attention to the very large number of unemployed youth. It then suggested fundamental reforms in various fields to correct the major imbalances in foreign payments, in the economic structure, and in the labour force, examining such issues as land reform, educational reform, incomes policy, technology, population policy and foreign economic policy.

Wijesinghe's study (1976) is a critical analysis of development policies of Sri Lanka during the period 1948-1975. The changes that have taken place during this period are so vast that they needed elaboration. Wijesinghe has done that in the most satisfactory manner to suit the needs of university undergraduates as well as members of the business community.

After an overview of Sri Lanka's economy from 1948-1975 he critically examined the respective roles played by the private and public sectors in post-independent Sri Lanka. In so doing he has attempted to evaluate critically the economic policies of successive governments. Controversial issues like foreign aid, food subsidies, and welfare measures were skillfully debated in this study. The book as a whole is informative and thought-provoking.

In the late fifties a number of distinguished economists from abroad visited Sri Lanka on invitation and investigated on the nature of the economic problems and recommended certain plausible solutions. Some of these reports were published in a single volume in 1959, by the National Planning Secretariat as *Papers by Visiting Economists*.

J.R. Hicks was one such visiting economist; in his paper, he posed the problem of bringing about an expansion of employment on a large scale while maintaining the general standard of living. Hicks attacked the misconceptions of some economists that expansion of employment in agriculture is hardly possible on account of diminishing returns to land, increasing population, and that the needful accumulation cannot be brought about without forced saving. The basis of such misconceptions, Hicks argued was the implicit assumption that production in the island was better organised. He disagreed with that view, and argued that it was on the improvement in the efficiency of production, first in agriculture and then in other sectors that the hope for the solution to unemployment problem ultimately lies.

The problem of economic development was the theme of Kaldor's paper. Contrary to the view that the plantation economy was the primary cause for the problems of economic development he argued for further development of the plantation economy to ensure rapid increase of Sri Lanka's national wealth. On the question of nationalisation of plantations he opined that it was not an issue raised solely on economic considerations but also on emotional grounds. He accepted the importance of industrial development but in the absence of capital and technical knowhow the need for foreign investments was accepted. At the same time he pointed out that there was no basic contradiction between the growth of public enterprise in basic sectors of the economy and the simultaneous encouragement of foreign investments in fields where development could not take place without their participation.

2. Journals

Due to limits imposed by the clientele and the comparative dearth of economists, Sri Lanka could scarcely boast of a large number of journals on economics. Yet the few journals currently in circulation had maintained high academic standards.

It has been mentioned at the outset that in the period immediately following the establishment of the University of Ceylon the literature on the Ceylon Economics was negligible. Consequently, like the books published thereafter the contributions to journals were mainly in applied economics, a feature which continued up to the early 1960s. The *University of Ceylon Review* and the *Ceylon Economic Journal* provided space for the publication of such researches in the 1940s but one that contributed most in this direction as well as one that drew a significant readership among the undergraduate population and students interested in economics was *The Ceylon Economist* that remained in circulation up to the early 1960s. In the period immediately after independence the *Ceylon Economist* devoted much on an analysis of the economic problems of Sri Lanka, particularly those of agriculture. In the first volume, Gamini Corea (1950) for instance, wrote on *The Problems of Economic Development in Ceylon* where several factors impeding development were identified. The imbalance between population growth and production, low capital accumulation due to low productivity of agriculture and the great need to increase the productivity of agriculture and labour through technological improvements were some of the issues which affected the economic development of the country. Loganathan (1952), on the other hand, writing on an identical problem warned of the heavy dependence on commercial crops during a period when natural rubber was threatened by the introduction of synthetic products. The remedy, according to him was industrialisation with foreign capital. P. Kandiah (1950) analysed the problems of agriculture, rural unemployment and poverty. Until the mid 1950s the journal was confined largely to such problems; thereafter the editorial policy changed. The journal began to provide critical analysis of the economic policies of the government. With changing political situations and deteriorating economic conditions the government began to play a more positive role in economic development. *The Ceylon Economist* did a great service in critically evaluating various measures taken by governments in economic planning. Views of both the public and private sectors on economic planning were published in the journal. The Ceylon National Chamber of Commerce (1957) outlined the role of the private sector within planned economy. An article in 1958 compared planning in Ceylon with that of India, China and Soviet Union and concluded that Ceylon's case was a sort of visionary planning or an academic exercise rather than a concrete and realistic programme of section (Bandaranayake, 1958). An article of high academic value on the same theme by the eminent economist, Oscar Lange, featured in a 1959 issue. The same issue carried an article on the fulfilment of the first five year plan of China analysing its success. The main characteristics of the rural economy and the problems encountered by the peasantry was comprehensively dealt with by Kelagama (1959). Among other articles on rural agricultural problems, the one on the *Guaranteed Price Scheme for Paddy* (Uswatte-Arachchi, 1961) deserves special mention. The journal also provided ample opportunities to discuss some of the controversial bills, enacted by the government during this period. *The Paddy Lands Bill* (Kelagama, 1958), *the Crop Insurance Bill* (Navaratne, 1958), and *the Co-operative Development Bank Bill* (Gunawardhana, 1959) for example, were brought under close scrutiny of economists.

The Ceylon Journal of Historical and Social Studies (CJHSS), started in 1958 as a multi-disciplinary journal to provide opportunities for the publication of articles on economics which were of topical interest. But being a journal catering to a wider clientele some of the articles were written to suit the general reader. The journal also brought into focus matters of topical interest in the discussion of which a theoretical slant was given, catering more to economists than to social scientists in general. In the article, "An Economic Policy for Development" (Salgado, 1963) for instance, the issues discussed were: the question of, and limits to, deficit financing; import controls and import duties both as correctives to a balance of payments deficit; the mutual relationship of import controls and import duties as well as to government deficit financing; the impact of budgetary and import policies on domestic prices. Another issue of topical interest in the early sixties was the role of foreign capital in the economic development of the country. Kanesathasan's (1963) article provided in this respect an illuminating discussion on the essential requirement of foreign capital for development with the qualification that it should largely be the subsidised variety of aid. The future of our rubber exports in the light of expanding synthetic rubber industry was yet another burning issue in the early 1960s. The gravity of the problem was very apparent for Sri Lanka because by that time the United States produced 90% of the world's synthetic rubber (excluding Soviet Union) and consumed nearly 30% of the total world export of natural rubber. Ananda Meegama's (1963) study on the "Competition between natural and synthetic rubber in the U.S. market" attempted to determine those factors which influenced the variations in the consumption respectively of synthetic natural and reclaimed rubber in the United States between the years 1947-1957. The study was based on an econometric model.

Partly because of the dwindling readership in the English medium and partly because of the spiralling costs of production these journals regrettably ceased to be regular publications in the mid-sixties.

3. Department of Census and Statistics

The Department of Census and Statistics of the government of Sri Lanka is the oldest, best and the more widely known research centre. The Department's first publication was the Census report of 1871. Thereafter decennial reports have been published up to 1931. The war interrupted the publication of 1941 report and was published in 1946 and thereafter they were published in 1953, 1963, 1971, and 1981. Since 1952, the department has also been publishing almost every ten years a *Census of Agriculture*. Besides, the department also publishes the *Sri Lanka Yearbook* and *Annual Statistical Abstracts* of population and demographic data, labour and employment, agricultural production and land use, forestry, fisheries, industrial, products, transport and communications, prices, trade, external payments, public finance, banking and insurance and business institutions.

4. The Central Bank Publications

Besides its research papers and survey reports, the Central Bank brings out a few important regular publications, incorporating the results of research into various aspects of the economy. *The Bulletin* is a monthly review of economic trends and developments in Sri Lanka published in Sinhala, Tamil and English. It comprises mostly of statistical tables and charts, pertaining to various aspects of the economy. There is also the *Annual Report* which is a statutory publication submitted to the Ministry of Finance. It is by far the most important publication consulted by economists, administrators, politicians and others interested in the economic performance of the country. Since 1975 another annual publication

The Review of the Economy was being published by the Central Bank. It gives a more detailed analysis of economic trends and developments in Sri Lanka which earlier formed a part of the Central Bank *Annual Report*.

The Bank also publishes biannually the journal called the *Staff Studies*. The research papers are written mostly by senior economists on the staff of the Bank.

5. People's Bank

The People's Bank, which is a Government Corporation, established a Research Division in 1974 with two major activities in view. One, to carry out research on matters of interest to Bank's activities and the other, the publication of the *Economic Review* which according to the Research Division, is to cater to the needs of the decision makers. It is a monthly journal published in Sinhala (10,000 copies), Tamil (2,500 copies) and English (3,000 copies).

Given the clientele and given the purpose for which the publication of the *Review* was initiated we cannot except the magazine to devote itself to theoretical studies.

Mindful of the readership (Advanced Level Students, undergraduates, administrators etc.) *The Review* had always made it a point to maintain a style of simplicity and the contents are both informative and analytical. *The Review* has emerged as a popular source of reference in schools and in universities. The contents of the journal are divided into three parts: Feature articles of topical interest; cover story or a special article; and columns giving short analyses of the economy covering Banking and finance; agriculture and commodity trade.

6. Marga Journal

The *Marga* quarterly journal, is devoted to the issues of development pertaining to developing countries in general, and to Sri Lankan society in particular. Its objective throughout had been to provide a forum for an active interchange of ideas, which would promote a critical inquiry into the country's social and economic problems.

7. Articles

A remarkable feature in the growth of economic literature on Sri Lanka in the recent past was the astonishing manner in which the number of articles, monographs, and other publications increased.

A significantly large number of them are in published form. Several factors contributed to the remarkable increase of such studies.

Sri Lanka entered the development decade in the seventies when decentralised planning assumed importance over centralised planning. In the seventies, economic problems were aggravated due largely to the worsening balance of payments problem and the inflation created by the oil crisis. Its ultimate outcome was the need to increase production all-round with the dual aims of making less reliance on imports and increasing employment opportunities. In this context economic research became purposeful, action-oriented and policy relevant. Above all, economic research got out of narrow confines and began to embrace all areas of economic activity. The demand for this type of research naturally came from the government and consequently the bulk of such research was undertaken by government or government funded institutions. Besides, researches in this group were overwhelmingly at micro-level.

Most of the research articles on the major cash crops, tea, rubber and coconut too conformed to the general principle of micro-level studies, and were on both plantation and small holdings. The main emphasis in such studies, however, seemed to be to explore the possibilities of income generation not so much by mono-culture but through crop diversification, live-stock farming, etc. A 240 page comprehensive monograph on crop diversification on tea and rubber lands was prepared by a UNDP/FAO team in 1976. The study in brief put forward proposals for crop diversification of uneconomic tea and rubber lands and also a rural development programme for the mid-country of Sri Lanka.[8] The great potential in the coconut lands for increasing production, income and employment generation became a subject of extensive research. Between 1965 and 1980, nearly 60 articles and monographs were written on the coconut industry in Sri Lanka covering both plantations and small holdings.

No sector of the economy was subjected to such intensive micro studies by local and foreign researchers as the rural sector. Here the analyses were not confined to the staple product paddy, but covered a large number of minor agricultural products, such as vegetables, onions, chillies, potatoes etc., the cultivation of which became commercially viable with import restrictions after 1966. The studies also dealt with hitherto neglected aspects such as land use, input-output, cost of production, credit price and market organisation. The studies were undertaken largely by the ministries of Agriculture, Food, Finance and Planning and the ARTI.

The Department of Agriculture carried out a series of studies on the cost of cultivation of food crops the results of which were presented in the form of valuable statistical data. One such study was on the cost of production of rice, chillies, potatoes, onions, cowpea, soya beans and maize. ARTI had completed two studies on the cost of production of paddy in the two seasons, *Myala* and *Maha*. The studies were conducted to meet the long-felt need and were meant to provide information on the cost factor and resource use patterns that are necessary guides in policy formulation. The first study in 1972, based on farm records, dealt with both the cost of cultivation of an acre of paddy and the production cost of a bushel of paddy under different agroclimatic conditions. The results indicated the possibility of increasing income through greater use of family labour. The second study was undertaken as a sequel to the earlier study. The increased cost of inputs and the revision in the guaranteed price of paddy necessitated a study of the costs involved in paddy cultivation. Variations in production costs were revealed in terms of tenurial conditions.[9]

The same institution published a comprehensive study on the economics of vegetable production in Sri Lanka. This exhaustive study attempted to determine whether the increase in price of vegetables was the result of any contraction in the area under vegetable cultivation. Another aspect explored was whether some of the vegetable cultivators were shifting their land resources for the cultivation of subsidiary crops.

As paddy production increased since the late sixties, the problems of processing and storage became an important concern in Sri Lanka. In this context the UNDP/FAO report of 1980 with recommendations for the establishment of an agricultural product processing centre for the testing, grading, processing and storage of rice was a valuable study on the subject.

The harsh effects of the oil crisis on the Sri Lankan economy prompted Sri Lankan scholars to search for alternative energy policies which resulted in some useful publications. The most comprehensive study, however, was by the Ministry of Finance and Planning. Based on an analysis of energy consumption, hydroelectric power and power demands it presented an energy policy for Sri Lanka. This was followed by another study by the same Ministry forecasting the future demand for energy in Sri Lanka. The forecase took into account the hydroelectric power production from 1978 to 1990 under the Mahaveli development plan and the problems of electricity supply to the Free Trade Zone.

The importance of the fisheries sector to the economy of Sri Lanka, came to be realised in the successive economic plans but it was not until the late sixties that serious steps were considered for its development. Recently, studies have been conducted covering aspects such as mechanised fishing, equipment, and investments in fishery harbours.

A comprehensive report prepared by a group of consultants of the Asian Development Bank, put forward detailed project proposals for fishery development on the West Coast of Sri Lanka. The Ministry of Fisheries developed the East Coast fisheries project for the implementation of which it sought international assistance. The same Ministry published a report on fishery development and the feasibility of joint ventures. An FAO funded study (1978) made an evaluation of fishing equipment manufacture in Sri Lanka portraying demand projections up to 1982.

Public investments began to play a key role in the economic development after national independence. In the seventies and the early eighties, a part from the large number of development projects initiated by successive governments, the number of public corporations have also multiplied. The financing of most of such investments is largely from foreign loans and aid. They were also a vital element in the government's development strategy. Consequently, public sector investments and investment policies have come under constant appraisal by local and foreign experts. The World Bank, for instance, has issued reports from time to time reviewing the various on-going projects. One of them was a document in public investments for the period 1979 to 1983 in which the key issues were identified for aid financing by aid institutions and the macro-economic framework underlying development strategy was outlined. Another of the Bank's many reports was a study of Sri Lanka's economic and social system reviewing the questions of sectoral and general economic policy; and the need for an investment policy to attract financial and technical aid.

Perhaps no public investments programme had been so extensively researched as the *Mahaveli Development Project*. The researches were undertaken by foreign agencies, government aided and private research institutes and individual researchers. The numerous researches touched upon almost all aspects of that project. In the early seventies the *Mahaveli Developments Board* brought out a feasibility study report on eight volumes covering agricultural development, land settlement and hydropower under this project. The World Bank report of 1977 on Mahaveli was a project appraisal running into 172 pages which dealt with water resources, irrigation development and hydroelectric power development in Sri Lanka. An interesting study by ARTI related to pre-Mahaveli situation; it was a bench mark study of the H_4 and H_5 areas of the *Mahaveli Ganga Development Project* prior to commencement of construction work.

An analysis of research done in Sri Lanka after independence shown that research interest lay primarily in macro-level studies, consequent upon the dominance of post-graduate studies by University and Central Bank economists. Sectors such as plantations, foreign trade, banking and financial institutions, public finance, demography and economic fluctuations received a disproportionate attention of economists. Economic problems relating to the rural sector, the non-traditional export sector etc. received scant attention.

The 1960s saw a gradual shift in research emphasis. It became focussed on areas undergoing rapid economic change. The economy of Sri Lanka in the post-1960 era was faced with severe foreign exchange constraints resulting in a drift of economic policy necessitating the adoption of measures aimed at conservation of foreign exchange. Food imports being the greatest drain on foreign exchange, the increase in the domestic food production became the country's prime target. Diverse aspects of the rural sector thus received greater attention from economists than it did ever before.

The oil crisis in the early seventies imposed severe restrictions on the import of food and, the attention on the rural sector consequently became acutely felt. A bibliography by the ARTI shows that between 1960 and 1969 there were 33 published articles on the rural sector (on paddy and other grain crops) and 54 between 1970 and 1977 whereas in the period 1947 to 1960 not more than 10 articles covered this sector. From 1947 to 1969 the same bibliography contained only nine articles published on non-traditional export crops whereas the figure for the seventies was 25. Animal husbandry, vegetable and fruit cultivation, farm management and farm mechanisation constituted the new research frontiers in the sixties and seventies.

Settlement of peasants in the Dry Zone was yet another venture undertaken in the thirties but it was not until the late sixties that unemployment and a growing crisis in foreign exchange made it a part of the national agricultural policy. The Mahaveli River diversion programme, identified as the major development strategy of Sri Lanka became an important research area for both local and foreign scholars. Between 1975 and 1980 it was the subject of 44 published researches. Researches done on this project by CIDA (Canadian Development Agency) ran into several volumes. Subsequent research interests of economists overflowed into areas such as gemming and tourism which by that time had become important sources of foreign exchange. The oil crisis in the mid-seventies paved the way for studies on several problems of energy conservation.

Sri Lankan economists have scarcely contributed to economic theory though they have been engaged mostly in the analysis of local economic problems drawing liberally from economic theories propounded in the West. In research methodology, too, Western influence remained dominant. State-aided research organisations in particular showed an increasing interest in field surveys and to some extent multi-disciplinary approach in research studies.

Faced with numerous professional problems local economists contributed in no small measure to an understanding of the Sri Lankan socio-economic landscape. Economic surveys undertaken in the post-independence era have brought to light some of the economic problems of the rural sector. The contribution of local economists became basis for some of the important national economic policy measures initiated in independent Sri Lanka. The Paddy Lands Act, the People's Bank Act, the Crop Insurance Bill etc. of the late fifties and the early sixties are vital landmarks in the development of rural agriculture.

IV. Problems of the Profession

It is necessary to identify at the outset the problems confronted by those engaged in the teaching of the subject at secondary school level. Although the subject of economics has gained ascendancy over all other Arts oriented disciplines, it appears that there has scarcely been any corresponding improvement in the quality of teaching at schools. After more than two decades of teaching the subject in the national languages at university level and more than a decade after it had been introduced to the school curriculum the number of texts written or translated into national languages is woefully inadequate. Students depend almost exclusively on the teacher who resorts invariably to a dictation of notes. Most graduate teachers who had their university education after 1960 hardly possess a knowledge of English while a few who do possess some knowledge could hardly read and understand the English language texts in economics. Economists graduated in the English medium are few and many of them are near the age of retirement. The problem of securing materials is made more difficult by the short supply of even the available economic literature in school libraries. The *Annual Report* of the Central Bank, its *Review of the Economy* and the *Economic Review* published by the People's Bank are either in short supply or not easily available. This is an unfortunate situation when one considered the fact that G.C.E.(Advanced Level) syllabus on economics contains certain sections on the economy of Ceylon for which these publications provide essential reading material.

The School Census of 1981 claimed 1983 schools with Advanced Level classes in the Arts with 17,171 graduate teachers. Teaching facilities in economics show, however, an uneven distribution. A great divergence exists in the standards among schools. The rural schools suffer from both a dearth of qualified teachers as well as shortage of reading material. The urban schools, although spared of such problems, are nevertheless confronted with adverse teacher-pupil ratios preventing the students from being given personal attention. The classroom discussion is hardly possible. A random survey carried out by the author shows that the teacher pupil ratio in rural schools fluctuates between 20 and 30 whereas schools in urban areas such as Colombo, Kandy, Galle, Jaffna the ratio is above 40; in some schools it is as high as 70. The urban areas are treated as educationally advanced for the purpose of selecting students to universities. Consequently, candidates from such areas have to score higher marks than those from areas considered as backward for the purpose of gaining admission to University. Along with Sri Lanka's high participation in secondary education and the restrictive university admissions policy had made the G.C.E. Advanced Level Examination one of the most competetive examinations. This has not only distorted the meaning of education for the student, forcing him to cram up, it also has given rise to a thriving business of private tutories that have mushroomed mainly around Colombo, Galle, Jaffna, and Kandy. The majority of students following classes in these tutories are those studying economics. The teaching of the subject in these places is neither better nor equal to what is being taught in schools. What transpired from the discussions that the author had with some teachers of the areas referred to above are that the tutories have a baneful influence on the students.

The department of economics in the universities are better placed with regard to the access to knowledge since they are supposed to be in touch with contemporary trends in the discipline. The schools which suffer from a paucity of reading material and competent teachers should, therefore, have some sort of an academic link with the universities. The need for such a link was stressed by most of the teachers with whom the discussions were held and their suggestion is to have at least periodic refresher courses and seminars by university teachers of economics. Such programmes, the teachers believe would help update their knowledge of the subject.

1. Problems of Teaching Economics in Universities

The single campus system with all its defects was able to maintain reasonably high standards in the teaching of economics. Consequently, the country was able to produce some eminent economists not only to serve the needs of the country but also to hold positions in international organisations. That was made possible by a combination of factors: the medium of instruction at the University then was English, providing the undergraduates great access to knowledge; undergraduate enrolment for economics was of manageable proportions; and the recruitment of competent lecturers, who could teach through the English medium. It was not surprising, therefore, that the University of Ceylon was able not only to build up a solid core of qualified teachers but also could maintain high academic standards which gave the university a most enviable reputation among the Commonwealth Universities. From 1960 onwards the universities were confronted with the progressive decline in academic standards. The switch-over to national languages as the media of instructions in economics created the problem of competent teachers qualified both in the national languages as well as in English. The University of Ceylon considered the switch-over as sudden and was unprepared to teach the subject in Sinhala or Tamil. This created the problems of text books in the national languages, and the increase in the number of campuses from 1959 onwards made it possible to increase the intake of students to Arts faculties. However, it was no solution to the more serious problem of falling academic standards.

One of the alleged causes for the declining academic standards had been the inability of the students to read texts in English. In recent times the university authorities have started intensive courses in English for new entrants before they are formally admitted to courses of study. But the rising number of students and the severe dearth of instructors to teach English as a second language have imposed limits on the success of this programme. Basically, therefore, the problems of teaching economics both at universities and at schools are the same. There is almost a total dependence on the part of students on lecture notes rather than on their own reading. This system has imposed an onerous burden on the teaching staff, in the first place, by way of increasing the number of lectures per course. The heavy dependence on lecture notes by undergraduates on the otherhand has impaired the students of their analytical frame of mind. The result is, mass production of graduates at the expense of quality and a degree in economics has become a passport for a job rather than something of a sustained academic interest. The problem for the profession appears, therefore, that once the present generation of senior economists retire from service the country will suffer from a severe dearth of qualified economists.

2. Problem of Staff

A closer academic relationship between the teaching staff and the students through tutorial classes, seminars and discusions provides one major avenue of improving the quality of students.

The increase in the student enrolment for courses in economics in the universities has adversely affected the teacher pupil ratio. The Table 10 which gives the teacher student ratios for the popular Arts oriented subjects in the year 1972 shows that the comparative ratio for economics was high in the campuses of Vidyalankara and Vidyodaya.

TABLE 10

Teacher student ratio (Campuses and subject wise) 1972

Subject	Colombo	Peradeniya	Vidyalankara	Vidyodya
Economics (including Commerce & Political Science)	60.3	63.0	87.6	77.8
Geography	32.7	53.6	50.4	20.3
Sinhala	45.9	13.1	48.9	35.4
Hindu Civilization	33.5	1.4	4.0	1.5
Pali, Buddhist-Civilization	10.5	4.4	12.2	10.1

(Source: Administration Report of the University of Ceylon 1972).

The more distressing feature was the presence of a fewer number of experienced teachers of economics in all the campuses. The percentages of senior hands (grade of lecturer and above) to the total number of teachers in Peradeniya, Colombo, Vidyalankara and Vidyodaya were as low as 23, 29, 27 and 17 respectively.[9] It was unavoidable that a heavy teaching load was borne by probationary and temporary assistant lecturers who together formed more than 70% of the teaching staff. There is no doubt that the quality of teaching would have been badly impaired. Has the position improved after a decade? The current position -- staff and teacher - pupil -- are summarised in Tables 11 and 12. While the teacher - pupils ratio at Peradeniya had declined by some 10% in a decade, perhaps due to the establishment of a separate Department of Political Science, that of Colombo remained more or less unchanged. In the case of Kelaniya (formerly Vidyalankara) and Sri Jayawardanapura (Formerly Vidyodaya) the ratio which was excessively high in the 1970, had increased further. The recently established Ruhunu Campus (1979) maintained a comparatively favourable ratio.

In staffing the departments with qualified lecturers, Sri Jayawardanapura has made excellent progress partly because it was singularly fortunate in getting foreign scholarships for some assistant lecturers and partly because the department of economics itself started Post-graduate Degree Courses in Economics recently. While peradeniya had made slow progress in that re-

TABLE 11

Teaching staff (Economics) in different Universities - 1982-83

Name of Institute	P	S.L.	L	P.A.L.	T.A.L.	Total
Peradeniya	1	5	3	10	-	19
Colombo	1	2	1	9	-	13
Kelaniya	-	1	2	14	2	19
Sri Jayawardanapura	1	5	7	4	-	17
Ruhuna	1	-	-	6	3	10
Jaffna	-	2	2	12	6	22
Total	4	15	15	55	11	100

TABLE 12

Teaching staff (Economics) in different Universities - 1982-83

Name of University/ Campus	Staff x	Students	Teacher-pupil ratios
Peradeniya & Dumbara	29	1,489	1:51
Ruhuna	10	525	1:53
Kelaniya	15	1,332	1:89
Jaffna	22	945	1:43
Colombo	13	810	1:62
Sri Jayawardanapura	16	1,350 (1980-81)	1:84

x: Excludes Visiting and on leave

spect, the position of Colombo remained the same and that of Kelaniya had deteriorated further. The staff position of Ruhunu and Jaffna remained very weak. The number of lecturers with post-graduate training stated as a percentage of the staff strengths of the departments of economics at Sri Jayawardsanapura, Colombo, Peradeniya, Kelaniya, Ruhuna and Jaffna is 77, 31, 47, 16, 10 and 18 respectively. Hence, it is natural to expect a great deal of unevenness in the quality of teaching between the universities in Sri Lanka. If a comparative analysis of the tutorial staff of other departments is Social Sciences and Humanities in all the universities is made (Table 13) the overall staff position of departments of economics turns out to be more distressing.

The weaker staff position is alleged to be one of the plausible explanations for the non-revision of the economics curricula.

The shortage of the senior staff is mainly a result of brain drain. Before 1970, universities attracted the best talents because: (a) salary structure of the teaching staff of universities was on par with that of the Civil Service; (b) probationary study leave and sabbatical leave abroad were granted at university expenses; and (c) some universities provided residential facilities at nominal rent. Since 1970, due to restricted finances the universities ceased to provide funds for probationary study leave or sabbatical leave abroad. The same factor led to the abandonment of housing programmes in universities which created accomodation for staff a grave problem. In the post-1970 period several salary revisions were effected but the revisions were neither satisfactory in view of high rate of inflation nor were they on par with salaries of similar categories of employees in other sectors of the economy.

While such factors lead to an unbearable erosion of senior layers of staff, the Economics Departments did not seem to be able to retain or obtain the services of bright young economists to the universities. In terms of renumeration they are not equal to those with similar qualifications in other sectors. In the severe competition for getting foreign scholarships coupled with the poor facilities for post-graduate studies at home the prospects of the juniors being trained remain as thin as ever. A larger number of probationary assistant lecturers in economics, therefore, stagnate due to lack of opportunities for post-graduate studies.

3. Problems of Employment

Though manpower surveys have been carried out from time to time, none of them has addressed to the problem of graduate unemployment. The extent of graduate unemployment, however, is such that there is no doubt that most of the graduates of economics face the problem of acute unemployment as their counterparts in other social sciences.

TABLE 14

Tutorial staff by qualifications,
all Universities - 1980

Department	Total staff strength	With Post-graduate degrees	Percentage of post-graduates Degree holders
Sinhala	51	40	78
Tamil	5	4	80
Philosophy	19	9	47
Buddhist-Studies	39	32	82
Sociology	24	12	50
Geography	56	31	55
Economics	76	30	39
History	47	40	85
English	27	7	58
Language-Culture	8	8	100
Commerce	18	6	33
Fine Arts	4	1	33
Mass-Communication	4	1	33

(Source: *Post-graduate Education in Sri Lanka, Volume 1, Directory of Courses, Ministry of Finance and Planning*, 1982, p 207).

4. Problems of Research

Universities

An essential requirement in university education is the unity between teaching and research. The relevance of that requirement in the teaching of social science is expressed by Malcolin S. Adiseshiah in the following terms: "The disaggregation of social science teaching in accordance with varied and varying teaching aims, the diversification of the teaching content of the social sciences, the updating and keeping in line with explosive rate at which each discipline is developing and above all the relationship of the content to the realities of each of our societies and each of our countries depends on the research input into the teaching programme" (see Atal (ed.), 1974:42).

The departments of economics of universities in this country are seriously handicapped in achieving this vital academic requirement. In the first place, there is the problem of time arising from the very heavy teaching load. Data collected from campuses reveal that senior members of the staff do 12 to 15 hours of lectures and tutorial work, while assistant lecturers work on an average of 15 hours a week. In addition, time is spent on student guidance, examination work and preparation of lectures. Information collected from the Planning and Research Division of the University Grants Commission for the year 1980-81 shows that the total time spent per week on teaching and related activities of university teachers of economics varies between 40 to 60 hours.

There is also a widening gap between the growth of literature in economics and its use to enrich the teaching content of the discipline.

5. Problems of Research by Public and Private Institutions

The majority of non-university research organisations are government or semi-government institutions and in certain respects their problems differ from those of the universities. Those in the Central Bank, ARTI, People's Bank Research Division etc. are full time researchers. Hence in theory they are unlikely to be confronted with the problem of time. But in practice there are instances where some researchers in these institutions do face this problem.

It is continuous and sustained interest that makes research interesting and successful. In the case of some public sector economists their time is taken for day-to-day administrative duties and other activities such as preparing reports. This is particularly the case with some senior economists who are Divisional Heads; for them continuity in research is an impossibility. Compared with the economists in the universities and in the private sector those in the public sector have no independence. Unlike hard sciences economics is linked with politics and hence an element of uncertainty prevails for those in the public sector to express independent views. Even the Central Bank economists who enjoy semi-independent status, appear to work within a politicised environment.

There had been a growing tendency for the senior economists in institutions, like the Central Bank to be sent on secondment to various ministries as economic advisors which has given rise to two problems. Firstly, the institution is denied the services of senior economists and secondly, the economists sent in that capacity very often work under bureaucrats trained in other disciplines.

Private research institutions which are usually insulated against political and external influences are engaged in research on selected aspects relevant to the country's needs. They are, however, faced with the problem of easy access to official documents. Private research agencies, with enough time at their disposal suffer from the problem of continuity of research. 'Marga', for example, complained that bright young graduates recruited on high salaries equivalent to those in comparable institutions seldom remained long enough to carry out their assignments; they leave half way seeking security in public sector employment. Not only were research projects abandoned but the experience that the young graduates gained is lost to the institution.

6. Problems Common to Researches in Economics

Young local graduates engaged in research also display certain common problems arising from their social environment. The socio-economic environment in which the young economists live differ very much from what their counterparts experience in the West. Numerous social commitments from which they cannot opt out act as serious constraints on sustained research. A lack of continuity of research interests, on the otherhand, adversely affects the output of research. Inadequate library facilities is an insuperable problem. The need for a National Library and a Data Bank is acutely felt. The non-availability of reliable data even in the few metropolitan libraries is a serious handicap.

7. The Problem of Finance

The problem of funding is a major constraint in Sri Lanka not only for the development of research institutes for economics but also for continuance of on-going research. Although there are institutions such as the Medical Research Institute (MRI), the Ceylon Institute of Scientific and Industrial Research (CISIR), the Agrarian Research and Training Institute (ARTI), the Tea Research Institute, the Coconut Research Institute, the Rubber Research Institute etc. there is no separate institute set solely for the purpose of economic research. Of course, ARTI does research on agricultural economics and the Central Bank and the People's Bank have divisions of Economic Research but the funds allocated for these divisions are in no way comparable to that set apart for natural science research carried out by institutes like the MRI or the CISIR.

The privately run Marga Institute has somehow managed to raise its own funds. Of the three main sources of finance in the first year of its existence two were non-governmental namely the Friedrich Naumann Stiftung (FNS) and the International Development Research Centre of Canada. The third source comprised the various agencies of the United Nations such as UNCTAD, UNIRSD, and ESCAP. The FNS assistance, which was for four three-year projects, which the institute had formulated, contributed to the building up and training of a qualified staff and development of the Institute's research capacity. It was in order to reduce Marga's dependence on these sources that a Trust Fund was set up. Part of the finance came for the Institute's own earnings and part from a grant from the Ford Foundation. In 1975, its monthly budget was Rs.75,000. By 1979, it has risen to Rs.125,000 and at the end of 1981, the overall cost of running the Institute was approximately Rs.3.7 million a year.[10]

Scholars based in the universities face severe problem of finding funds for their research. What most universities do is to set a small fund for research to respond to the requests of individual researchers. But these are very small grants of around Rs.5,000 per project, which at current rates of exchange amounts to around US$250.

The financing of research publications particularly of university staff is also an issue that deserves consideration. The institutions like Marga and the Central Bank, People's Bank and ARTI confront practically no problem in financing their research publications as they have their regular channels.

As a result not only are valuable researches remain unpublished but there had also been a great deal of duplication of research. Apart from the paucity of funds for the publication of research monographs, there is also the problem of finding funds for the publication of regular professional journals.

In the early years of the growth of the discipline in the country *The Ceylon Trade Journal* and *The Tropical Agriculturist* provided opportunities for the publication of economic writings on Sri Lanka. These were followed by the publication of the *Ceylon Economic Journal* (CEJ) in the thirties. The *University of Ceylon Review* (UCR), started in 1943, was a multi-disciplinary journal which also published research articles in economics.

The *CEJ* ceased publication at the end of the World War Two. *The Ceylon Economist* (CE), begun in 1950, not only filled the vacuum but also saw the formation of the Ceylon Economic Research Association, the members of which were drawn from all institutions interested in economic research. Throughout the fifties and early sixties *The Ceylon Economist* served a valuable service for both the researchers and students of economics.

The Ceylon Economic Review of the early sixties published thrice a year by the Ceylon Association of Economic Studies too carried articles of similar importance. The early 1960s also saw the birth of the leaned journal, *The Ceylon Journal of Historical & Social Studies* (CHSSJ), a journal by the Ceylon Historical and Social Studies Board. This journal was intended to cover a wide range of social sciences including economics.

Unfortunately most of these journals that were started after independence did not have a continuity of existence. *The Ceylon Economic Journal*, the UCR, and *The Ceylon Economist* ceased publication while a journal like the *CHSSJ* are not published at regular intervals. The main reasons being that these were meant for the English reading clientele which began to thin out after the 1960s. Added to this was high cost of printing. Since the last decade there was also a trend for the publication of research articles in foreign journals rather than in local ones particularly by the university staff due to two main factors. Publications in foreign journals not only gave better recognition for promotions at home but also provided better chances of getting external funding for sabbatical leave etc. Consequently, the profession is now devoid of a single journal of its own. The current economics literature on Sri Lanka is mostly found in publications by institutions or in multi-disciplinary research publications.

8. Professional Associations

An aspect that has long been neglected in Sri Lanka is the formation of professional associations. The early fifties saw, for the first time, the formation of the Ceylon Economic Research Association and a decade later, The Ceylon Association of Economic Studies was initiated. With the closing down of the two associations, the profession also lost the two journals. At present the only fora for the professions seems to the 'F' section of the Sri Lanka Association for the Advancement of Social Sciences (SLAAS) and the Ceylon studies Seminar at Peradeniya. Both these organisations sponsor discussions, seminars on a wide range of subjects in the social sciences. Moreover, every University economics Department has an association which attempts to bring together students and staff together. These associations defined by Higher Education Act of 1978 as subject "Societies", endeavour to enhance the knowledge of the subject among students. Very often these societies publish an annual journal drawing contributions mainly from the students and staff. At times scholars from outside the universities are invited for talks on subjects relevant to their courses of study.

9. International Collaboration

There is a virtual lack of co-operation and interaction between Sri Lankan economists and their Asian counterparts. This is largely due to individual and institutional factors. It must be remembered that the discipline was introduced to Sri Lanka during colonial times. The approach to the subject and the text books used are overwhelmingly Western. Post-graduate training for economists continues to be provided in Western universities. Under these circumstances it is not surprising that as individuals our economists are more conversant with works of Western authors. Consequently, there is ignorance or total indifference to works done by the region's economists. This ignorance and indifference remains in spite of the community of interests among South and South East Asian lands under similar socio-economic change. At the institutional level, the lack of contact between various research bodies in Asia is more marked. On the other hand local research organisations and economists are in constant and close contact with U.N. Agencies and Western organisations, a feature inherited from the past. Moreover, the problem of funding is another reason why the Sri Lankan researches and research organisations collaborate more with western agencies. Referring to the situation, Atal rightly remarked: "Geographically proximate social scientists of the region still remain academically remote. They share a common cultural heritage of the East but do not have a cooperative fund of contemporary knowledge" (Atal, 1974:12).

Where the contents of teaching are basically of Western orientation, and research collaboration with Asian countries of common economic social and cultural problems is lacking there can hardly be a move towards indigenisation of economics teaching and research in Sri Lanka.

V. Agenda for the Future

The main problems facing teaching and research in economics have been examined in the preceding chapters. In the search for solutions to such problems it is very important that priority should be given to arrest the decline of standards of teaching both at school and the university levels. The vast literature available on the diverse aspects of economics is largely in foreign languages, mainly in English. The switch-over to the national languages as media of instructions in universities done in haste and in a state of total unpreparedness has seriously affected the quality of output as well as the growth of the discipline. What has been done since then to meet the demand for reading material by the new generation of students was translating a few English texts into Sinhala and Tamil and writing a few texts in the national languages. Such writings are not only woefully inadequate to meet the demands of the discipline from school to university level but also fail to keep abreast of advances in the discipline. While the present policy of teaching English as a second language must be continued it is desirable to arrest the declining standards. The following proposals need be considered for implementation immediately:

(1) Competent scholars within the universities should be encouraged to write texts and translate standard texts and research papers into the national languages, and such works should necessarily be considered for the promotional prospects.

(2) A programme of continuing education by way of frequent refresher courses, seminars etc. should be held for teachers in schools and junior staff at universities to make them conversant with the latest trends in the discipline.

The magnitude of the changes that have recently taken place in both scope and the subject matter of economics calls for urgent revisions of syllabi and curricula. With a regular drain of Senior staff the universities need take immediate steps to provide the junior members opportunities to go in for post-graduate research. In this connection a Post-graduate Institute of Economics, an establishment of which is long overdue, will help realise the following objectives:

(i) Pooling of scarce resources.

(ii) Attract foreign scholars.

(iii) Expedite the training of junior staff and minimise the dependence on overseas scholarships.

(iv) Reorient research on economic problems of developing countries with special reference to Sri Lanka.

Another alternative is setting up of an Institute of Asian Development Studies covering different social sciences disciplines. Apart from helping achieve the objectives listed above such an institute would also facilitate the growth of much needed multi-disciplinary approach in the teaching of and research in economics in Sri Lanka.

The dearth of trained economists in the country was made acute in recent times by the siphoning of senior economists of the Central Bank and the universities into the new corporations and boards in the public sector. The most unfortunate result, however, is that experienced senior economists were lost to research. In their new posts they seldom have the time for research nor opportunity for enrichment of knowledge. Very often their places are taken up by juniors which further declined the standard of teaching and research. The most rational step would, therefore, be to solicit the services of senior economists as advisers and consultants, taking care to avoid any bureaucratization.

As stated earlier a large volume of research material in economics, both published and unpublished is available within the country. Unfortunately such material lies beyond the easy reach of researchers, planners, policy makers, administrators etc. Valuable statistical data lie similarly scattered, and remain unavailable to those who need them.

The value of collaborative arrangements with foreign countries needs to be emphasised as an important factor for the development of the research potential in Sri Lanka. The association and interaction of our economists with those outside the country are limited. At an institutional level The Marga Institute, The People's Bank's Research Division and the ARTI do engage in some collaborative research. But at an individual level only an insignificant number of economists have foreign collaboration. Even that limited collaboration is not with the Asian countries.

Many disciplines, particularly, the hard sciences that faced similar problems have set up National Research Institutes with the government of Sri Lanka acting as the chief funding agency. A very significant research contribution is being made by such institutes as the National Engineering Research and Development Centre, the CISIR, the Veterinary Research Institute, the TRI, the RRI, the CRI, the ARTI and the Building Research Institute.* Very recently the Institute of Fundamental Research was established under the guidance of highly trained scientists who had demonstrated their eminence in their particular fields.

In view of the dominant role that economics is expected to play in the development efforts of the country alongside the circumstances under which research is being done, the expediency of founding a National Economic Research Council cannot be disputed. But in order to maintain some degree of independence in research it is desirable that in the event of such an institution being set up it should resort to both government and private agencies for funding. The primary functions of the proposed National Economic Council should be:

(i) Creation of infrastructures and facilities for research.

(ii) Facilitate the growth of a corps of research workers.

(iii) Sponsor priority level research programmes and projects.

(iv) Building up of a fund and the distribution of grants among institutions and individuals.

(v) Promote professional journals and professional organisations in economics.

(vi) Training in research methodology in economics and the promotion of inter-disciplinary and multi-disciplinary research.

(vii) Create and expand

  (a) Documentation Centre

  (b) Data Bank

  (c) National Register of economists and their research works.

(viii) Advise the government on

  (a) Economic research and their utilisation

  (b) Collaborative research arrangements with other countries (cf. Atal, 1974:57).

*** CISIR = Ceylon Institute of Scientific and Industrial Research**

TRI = Tea Research Institute

CRI = Coconut Research Institute

RRI = Rubber Research Institute

Another problem of the profession is that most of our economists operate within a limited horizon. The teaching curricula we have inherited are modelled on those of the Western (British and American) universities. The texts used are of Western authors. Our economists are, either ignorant or indifferent to developments in the immediate neighbourhood battling with common socio-economic problems. Therefore, it is time for the pooling of resources on a regional basis. For this purpose, the proposed National Economic Research Council can be instrumental in promoting co-operation along the following lines:

(i) maintaining professional contacts.

(ii) maintaining close relationships with research agencies in other countries.

(iii) promotion of collaborative research with Asian countries.

(iv) promote interchange of scholars.

(v) organisation of regional seminars on common economic problems.

(vi) maintenance of a Register of Asian economists and their research works.

Teaching in universities will scarcely be meaningful if research and enrichment of knowledge are not combined. Such a balance between teaching and research is scarcely attainable under a work load in the university departments. The lecture time of the teachers of economics in the universities varies between 12 to 15 hours. The latter can be taken as the norm in the case of junior members of the staff. They should in fact be given lesser number of hours mainly because of the fact that it is they who need training in research most. Moreover, a good deal or time of the staff is also taken for nonacademic work. Because of poor salary structure, some of the junior staff also do undertake other pecuniary assignments, and this affects their time budget.

All economics departments are relatively understaffed; and the teacher - pupil ratio is very high. The latter has given rise to the lecture method (more precisely the dictation of notes) in place of the discussion method. The improvement of the staff strength will serve the dual purpose of bringing staff-student ratio to manageable proportions and reduce the lecture hours. To some extent these objectives can be achieved in two ways. Firstly, make university teaching more attractive by giving better salaries and providing other facilities. Secondly, to adopt a more flexible recruitment policy. In this connection it is worth reproducing the following lines from an Annual Report of a senior Professor of Economics. "Placed as we are in our present circumstances, we should try to keep as many options as possible open before us in recruiting new staff members at junior levels. Too close an adherence to the normal schemes of recruitment may tie our hands unnecessarily and hold us prisoner of the present circumstances. What I mean is that we should cast our net as wide as possible to admit into our staff any experienced and qualified persons from outside even though they may not satisfy some of the requirements stipulated in our present scheme of recruitment".[11]

Research is not a dull academic exercise. It has a purpose the fulfilment of which requires firstly an identification of a clientele and then to make it available for the prospective user. These requirements can be fulfilled by an efficient communication strategy and an expeditious system of publishing the research findings. In Sri Lanka, the non-university research projects are usually government funded and are very often policy oriented. Therefore, the clientele for such research is pre-determined and its utilisation is more or less assured. The problem then is post-graduate researches most of which are either theory oriented or fall into the domain of applied research. The number of post-graduate researches in the different branches of economics completed since 1922 is very large and most of them are still in manuscript form. It is heartening that the Ministry of High Education in Sri Lanka has realised the usefulness of publishing the post-graduate theses of Sri Lankan scholars and has laid the infrastructure accordingly. However, with limited funds at its disposal the programme envisages the publication of all post-graduate theses. When we consider the total number of post-graduate works done by the Sri Lankan scholars during the past few decades we cannot predict how long it will take at least to publish the most important ones. It should be borne in mind that research findings in economics can be out-of-date in a relatively short period of time. Thus immediate action is called for.

Sri Lanka does not have a long tradition of economic research; a vast territory is left unexplored. Consequently, what has happened is that our researchers have given more attention to micro-level researches as well as for researches with short term economic objectives. Fundamental issues have escaped the focus of our scholars. Poverty, unemployment, inequality of income and the dependence on outside help for development are the fundamental issues in the economic progress of developing countries of Asia. But such problems have fallen into the domain of foreign experts. The ultimate result is an analysis of our problems through methodologies less applicable to our conditions. The most acceptable method would be a synthesis of both Western and oriental methodologies which essentially calls for collaborative research programmes. It is through such programmes or research that solutions to the problems of funds and methodology which hitherto were some of the impediments for researches can be found.

Another problem to be resolved in economic research is the issue of relevance. The government funded researches are at least in theory either policy-oriented or action-oriented. But the same thing cannot be said of researches by university and non-governmental organisations. What is unique about universities is the total absence of links with government bodies especially the planning authorities. What is more, very little of research goes into teaching. The purpose of research in universities, whether postgraduate or otherwise, had been mostly a means to rise in the professional ladder. What should be done therefore, is to evolve methods to bring economics departments closer to government organisations so that their researches could be made to contribute to national economic policies.

However, government policy is aimed at solving a multiplicity of problems faced by the human society. That requires looking problems not from the angle of an economist alone but also from the angles of several disciplines. An examination of the university economics disciplinary structure shows that it is not made to suit policy-oriented or action-oriented research requiring a multi-disciplinary approach. University teaching throughout had followed the traditional pattern and the departments have been functioning as closed compartments. Therefore, restructuring of the discipline in the universities has to be accomplished if the proposed link is to be made effective and meaningful.

Due to developments in the Post-war period the discipline of economics has gradually assumed great importance within the social sciences. The number of teachers of economics has increased. So has the number of professional economists and researchers. In the universities their teaching load is comparatively high. The research output of economist was significantly high and their contribution to post-independent economic development of Sri Lanka was significant. Unlike those in hard sciences, humanities and in communication sciences the economists, to this day, however, have not been given due recognition. Except those in very high positions others are not known in the country. Their specialisations are not known to those in search of their services. They have neither a forum to interchange their ideas nor do they have an organisation to represent the problems peculiar to their profession.

FOOTNOTES

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FOUR

NEPAL: *Badri D. Pandey*

I. Brief History of the Discipline in the Country

The history of modern Nepal begins with the unification of the country in its present composition by the late King Prithivi Narayan Shah and his son Bahadur Shah during the second half of the eighteenth century. But it was not until the middle of this century when significant changes in the way of living of general people began to take place. The principal reason for continuation of this traditional mode of living is the ceaseless preoccupation of the leaders with the security of their families and of their own. The rulers, therefore, concentrated their efforts on economic exploitation of the country to their advantage, rather than on initiating programmes of economic development of the country (See, Sharma, 1970:437-38).

It was as late as 1956 that planned economic development was started. Until that date, and to a large extent still today, the traditional economic activities are being continued. Nepal's 30,000 small villages, where most of its population reside, have seen little change in their economy. Many factors such as lack of transportation facilities, poor channels of communication, poverty of natural resources, and widespread illiteracy are responsible for this state of affairs.

A primary school to impart modern education was first established in Nepal in the year 1854. The entrance to this school was, however, limited to the children of the ruling Rana families and those of their palace employees. It was only during the turn of this century that the school was open to the general public.

The first institution of higher education, Tri-Chandra Campus, was established in 1918 where classes started in 1919. Classes in economics had first started in 1923 with the introduction of the Bachelor of Arts programme at the Campus. Santosh Kumar Das, an Indian citizen from Bengal (India) was the first to teach economics. In the early years of Tri-Chandra Campus all of its teachers were brought from India.

Teaching of economics in Nepal is very much influenced by teaching of economics in India. As Nepal lacked a university of its own the students of Tri-Chandra Campus were examined by the Patna University. The subject of economics also had to be taught to Nepali students according to the syllabus of Patna University. It should be noted that the Indian system of modern education was also influenced by Great Britain which kept India as her colony until 1947.

From the 1930s Nepali students began pursuing their postgraduate education in economics in Indian universities. Their return eased the shortage of Nepali economics teachers. It was also a beginning toward ending the dependence on teachers imported from India.

In 1952 Y.P. Pant became the first Nepali citizen to receive a Ph.D degree in economics. He received his degree from the Banaras Hindu University, Varanasi, India.

Nepal established its first University -- Tribhuvan University -- in 1959. Economics was one of the eight subjects offered by the University. With its establishment the affiliation of Tri-Chandra and other colleges with Patna University came to an end. Besides conducting its own postgraduate programme Tribhuvan University affiliated a number of colleges in the country, most of which were running undergraduate programmes in economics as well.

After the inception of the National Education System Plan (NESP) in 1971 academic programmes were organized under the semester system. With this change more quantitative techniques and the content of Nepalese economy were incorporated in the instruction of economics. Stress was also laid on the importance of research; students were required to write a thesis as a partial requirement for their master's degree. In 1981, the semester system was again converted to the former system. In this change, while much of the course content in economics has remained the same, thesis writing has been made optional.

Even after the establishment of Tribhuvan University teachers from India continued to play an important role in the teaching of economics in Nepal. The Department of Economics was headed by Indian professors and a number of them were in the teaching faculty under the Colombo Plan until 1970. Even though most of the economics teachers today are Nepal citizens a large number of them have received their training from India. Their training experience is very much reflected in the economics curriculum.

In the usual sense various "schools of thought" do not exist in Nepal. A favourable climate in this direction has not yet been developed. For many years after economics was developed at Tri-Chandra Campus, the subject was taught as 'political economy' (Timilsina, 1973:215). The admixture of politics and economics in the curriculum continued until 1943 when economics instruction was separated from the Political Science Department. It must also be said that economic analysis was not the basis for decision making process in the government. The guiding principles were ethical ideas and the whims of the decision makers. It is not possible, therefore, to document the factors that facilitated the introduction of economics, and the manner in which the different branches of this discipline developed in the country.

Role of Mathematics and Statistics in Economics in Nepal

Mathematics and statistics are now an integral part of economics curricula both at undergraduate and postgraduate levels. At undergraduate level students are required to acquire such knowledge in statistics as dispersion, moment, kurtosis, skewness, correlation, index number, analysis of time series and straight line and fitting second curves. They learn also sunctions, limit, differentiation, interaction, and maxima and minima upto three variables.

One of the eight papers prescribed for graduate level training in economics consists of quantitative techniques. The paper includes both mathematical and statistical methods. Matrix algebra, elementary set theory, linear programming, input-output analysis, and game theory cover the mathematical portion while probability, elementary sampling theory, simple and multiple regression analysis, F-test, T-test, binomial and normal distribution, and unisquare test cover the statistical portion.

Apart from the degree programmes, the Curriculum Development Centre of Tribhuvan University organizes occasional training programmes in economics with particular emphasis on quantitative techniques for economists.

The National Computer Centre (NCC) is the only major institution with large scale computer facilities. It was established in 1974 with the purpose of running the IBM 1401 second generation computer previously run by the Central Bureau of Statistics, a government information centre. The computer had first been brought to Nepal in 1971. The NCC recently purchased a fourth generation computer, ICL 2950/10, which has greatly increased the Centre's data processing capacity. Besides NCC, a few other institutions, such as the Agricultural Projects Services Centre, own mini computers.

The economics faculty of the Tribhuvan University does not own a computer of any kind. The need for one is obvious, however, since the students are required to solve such quantitative problems as multiple regression up to five variables.

The Department of Economics at Kirtipur Campus, where most of the master level students are enrolled, expects to acquire a mini computer of its own in the near future. The National Computer Centre also plans to set up a terminal at that campus. These efforts, when materialised should alleviate the shortage of computer facilities for economics faculty and students.

Interdisciplinary approach to instruction at formal higher education level is new to Nepal. However, students in the Institute of Management, Institute of Education, and in some other institutes acquire some knowledge in economics. High school students can also take a course in economics on an optional basis. The course familiarizes the students with the economic situation of Nepal. Non-formal training programmes for a short duration are provided on a regular basis by Tribhuvan University's Centre for Economic Development and Administration and by Agricultural Projects Services Centre. These centres offer interdisciplinary courses designed for providing refresher training to government and non-government officials.

II. Infrastructure for Teaching and Research in Economics

Infrastructures for teaching and research in economics in Nepal have widened to an impressive extent within the last three decades. At present 24 campuses under the Institute of Humanities and Social Sciences of Tribhuvan University (TU), and 30 private campuses offer courses in economics at undergraduate and postgraduate levels. Some of the faculty members of these campuses are engaged in research relating to economics. There are also a host of university controlled and private organizations actively involved in economics research.

Tribhuvan University Faculty and Student Profile

The Institute of Humanities and Social Sciences (IHSS) of TU has 24 campuses which offer Bachelor level programmes in economics. At present, there are 162 faculty members in these campuses with at least a master's degree in economics. In 1982, there were altogether 23 staff members(Professors, Readers, Lecturers, and Assistant Lecturers) at the Kirtipur Multipurpose Campus. This is the largest concentration of instructional faculty members among the departments of economics under TU. Other campuses with a significant number of teachers include Padma Kanya Campus and Patan Multipurpose Campus in the Kathmandu Valley both with 12 faculty members each. Prithivi Narayan Campus of Pokhara also has the same number of faculty members. Biratnagar's Mahendra Morang Adarsha Multipurpose Campus has 11 individuals in its economics faculty while Ratna Rajya Laxmi

Campus and Tri-Chandra Campus have nine teachers each.

Nearly after a decade of TU's control of higher education private campuses were allowed to operate once again begining in 1980. So far 39 campuses have been allowed to operate. These campuses offer a two-year proficiency programme in humanities and social sciences, management, and natural sciences. Over 30 of these campuses offer courses in economics as well. Data on these faculty members are not available but a large number of them work part-time with their full-time appointment with the various campuses of Tribhuvan University or elsewhere.

Most of the faculty members received their training from TU. The university offers master's degree programmes at its Kirtipur Multipurpose Campus in Kathmandy, at Prithivi Narayan Campus in Pokhara, and at Mahendra Morang Adarsha Campus in Biratnagar. A significant number of faculty members have received their training from Indian universities. A few were trained in other countries such as the USSR and the United Kingdom. Some of the faculty members received their Ph.Ds from Tribhuvan University, Indian universities, and from USSR. The faculty members returning from abroad have specialized in such fields as econometrics, international trade and labour economics.

At the degree granting institutions faculty members have specializations of their own. At other institutions they can be described as generalists.

Faculty Income Level

College and university teachers in Nepal are classified into four main categories: Assistant Lecturer, Lecturer, Reader, and Professor. The starting monthly pay for an Assistant Lecturer is Rs.875* with an annual increment of Rs.25. The maximum amount of salary that an individual can draw from this post is Rs.1,275. A Lecturer begins his job with a salary of Rs.1095. The highest amount possible for this post is Rs.1,515. The beginner's pay for a Reader is Rs.1,500 per month with a maximum of Rs.2,050. A Professor's initial pay is Rs.1,825 which reaches its ceiling at 2,125.

A sizeable number of faculty members in the Kathmandu Valley supplement their income by teaching part-time in private and other campuses. Some of them serve as part-time consultants to research agencies within and outside TU. TU service faculty members are paid additional amount of hardship allowances to those working in rural areas. The amount ranges from 25 per cent of the salary to 75 per cent of the salary depending on where the appointment is. Private campuses also have their own system of payment. Some of those campuses pay their teachers more than TU does while other pay less.

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* A rupee is equivalent to about US$0.08; or a US$1 equals Nepalese Rs.12.50 (1982 prices, now the dollar has gone up).

Undergraduate and Graduate Students in Economics

Teaching of economics begins at Proficiency level. High school graduates who complete a total of ten years of schooling are admitted to this level. At this level, the students who are enrolled in humanities and social sciences programme take two courses in economics out of a total of eight courses. The economics majors at Proficiency level are required to continue it during the two additional years of bachelor's programme. In 1978 there were a total of 1471 bachelor level and 262 master level students enrolled in 19 different campuses of Tribhuvan University (Appendix B). The number of female students was 378. In that year a total of 2685 students were enrolled at the bachelor level programme under IHSS. Considering the fact that economics is only one of the several programmes offered by the Institute the enrolment figure is remarkable. In 1981, nearly 2000 bachelor level and master level students had chosen economics as their major subject of study.

Curricula at Undergraduate and Graduate Level

At the Proficiency level students are offered two papers in economics carrying 100 marks each. By the time they are through with these papers the students familiarize with the basic concepts of economics and acquire also some elementary knowledge of Nepalese economy.

Economics is taught more intensively at the bachelor's level. The Institute of Humanities and Social Sciences has set the following objectives for the subject:

> The objectives of the courses at the bachelor or degree in economics are to familiarize in detail the students with important theories, their use in the context of Nepalese economy and economic system. They are also expected to acquire some knowledge of basic mathematics and statistics in order to enable them to understand the current development in the discipline.

The economics papers offered at the bachelor's level carrying 100 marks each are: Principles of Modern Economics, Economic System and Planning; Monetary Economics, Public Finance and Quantitative Techniques; and Economic Development in Nepal. The first paper provides students with knowledge about consumption, production, exchange, distribution, rent, interest, profit, systems, economic growth, and planning. The second paper covers such topics as money, banking, international trade, foreign exchange, public finance, statistics, and mathematics. The third paper acquaints the students with such economic aspects of Nepal as natural resources, human resources, agriculture, land reform, rural market, industry, banking, planning, company, corporations, and other Acts.

During their two-year master's programme students take eight papers of 100 marks each. In the first year, they are required to take Theory of Economic Analysis (micro and thought), Quantitative Techniques, and Economic Development and Planning. In addition, the students select one course from among the following: Economics of Agricultural Development; Mathematical Economics; Demography; Modern Economic Development of U.K., Japan, India, and China; Co-operation and Rural Economics; and International Economics.

During their second year the students are required to take Economic Analysis (Macro and Welfare), Monetary Theory and Policy, and Public Economics and Policy. They choose one more course from among the following: Marketing Economics; Managerial Economics; Manpower Economics; International Finance and Economic Integration; Econometrics; and thesis writing.

Institutional Research Programme

Research in economics is carried out mainly by the research units of Tribhuvan University and by private agencies. The Centre for Economic Development and Administration (CEDA) has the largest number of staff (21) with economics background among the university research units. The other units include the Research Division and IHSS.

Outside of the University the Agricultural Projects Services Centre (APROSC) employs the largest number of research staff with background in economics. With a total of 25 staff members in the field in 1981, APROSC topped the economics faculty at Kirtipur Multipurpose Campus which has the largest number of economics teachers. The other important agencies that have engaged in research relating to economics are Nepal Rashtra Bank (Central Bank), New Era, Integrated Development System, and

National Research Associates. There are about a dozen more newly established private agencies which employ full-time staff trained in economics. The background information on selected research agencies and their staff appears in Appendix C.

Nearly all of the private research agencies' full-time staff and most of the staff of TU research units had master's degree from TU. Some of them were trained in India, the Philippines, Thailand, USA, UK, and Australia. In addition to a handful of full-time staff the private agencies maintain a list of qualified economists who are mostly TU faculty members and employ them as part-time consultants whenever necessary. The consultancy fee is generally attractive so the research agencies have usually no problem in getting the services of the individuals they want to hire.

Since the research agencies are able to utilize the services of consultants with varying background, they are willing to undertake research projects in most areas. Even for the purpose of staying in business the research agencies cannot afford to stick to one or two specializations alone. A sizeable number of them, however, engage in feasibility studies, socio-economic study, and evaluation studies.

Research activities in and outside the university can be divided into the following three different areas:

1. *Academic research.* With the implementation of the National Education System Plan in social sciences in 1973 master level students wrote a dissertation as a partial fulfilment required for their degrees. This provided an unique opportunity to students to know their own country better. In less than a decade hundreds of dissertations have been written by those students in such Nepalese economy related areas as agriculture, industry, banking and monetary policy, foreign trade, regional planning, and population and migration (See Shrestha and Dahal 1978).

Doctoral dissertations written by TU students are other examples of academic research. Between 1977 and 1981 six students successfully completed their dissertations from TU. The titles of these dissertations are worth mentioning:

a) Role of Agricultural Taxation in Nepal's Economic Development.

b) Impact of Tribhuvan Rajmarga (highway) on Nepalese Economy from 1950-1975.

c) Population Dynamics of Nepal

d) Regional Planning with Special Reference to Nepal.

e) Industrialization in Nepal: Import Substitution or Export Promotion Industries.

f) Problems and Potentialities of Industrial Development of Western Development Region of Nepal.

Students pursuing their doctoral work in India and other countries also have selected various topics related to economic aspects of Nepal for their dissertations. The number of such students studying particularly in India is on the increase. This is mainly due to the faculty development programme of TU under which senior faculty members are sent to Indian universities for Ph.D education at the expense of Tribhuvan University.

2. Policy research. This is a major research area in which both the university and outside agencies are involved. The Research Division and IHSS encourage faculty members to conduct research. The latter provides a grant of Rs.3,000 for a study project. In 1982 alone seven study projects in economic policies and feasibility studies in related areas were approved. After the study projects are approved, the researcher is assigned a guide and the completed study is evaluated by two experts.

CEDA and such private agencies as New Era, Integrated Development System, and National Research Associates also conduct research relating to policy matters.

3. Feasibility and evaluation studies. Extensive works on feasibility and evaluation are carried out by TU's CEDA and government affiliated APROSC and Industrial Development Centre. Some of the private agencies also occasionally undertake research in these areas.

Sources of Funding

There are three major sources of funding which support research endeavours relating to economics: Tribhuvan University, government, and international agencies. Most of the research activities originating from IHSS, CEDA, and Research Division are financed by TU. APROSC, Industrial Development Centre, and some private agencies receive substantial amount from the government to support their work. The activities of these agencies are funded also by the World Bank, United States Agency for International Development, Canada's IDRC, and various UN agencies.

The budget for research varies from year to year. For the year 1982-83 the budget of IHSS for research amounted to Rs.100,000 of which Rs.21,000 was allotted to projects undertaken by economics faculty. For the same year CEDA received a budget of Rs.600,000 three-fourth of which was to be spent on research relating to planning and economic policy, rural development, and population and human resources. The budget of APROSC, Industrial Development Services, and private agencies largely depends on the nature and number of projects sponsored by the government and international agencies.

Faculty Development

More so than ever faculty members have the opportunity to professionally upgrade themselves. Because most faculty members teaching master level students supervise their students' theses, they are exposed to a wide variety of research areas. Research agencies within and outside of TU also employ the services of faculty members as consultants or experts which enriches research experience of those faculty members and also provides them with some extra money. As mentioned earlier, TU has been sending a number of faculty members for their Ph.Ds at its own expense to various universities in India under its faculty development programme.

Major Difficulties in Undertaking Research

In spite of all these efforts in favour of research activities a number of problems in this regard still persist. First of all, there is a dearth of literature and library facilities. Even the TU Central Library located at Kirtipur Campus is not equipped with a satisfactory number of books and well-known international journals. Most of the campus libraries scattered throughout the country have a limited number of books in various subjects combined. They contain only a few journals and newspapers.

Secondly, the funds set aside for research purposes at IHSS are so small that only a handful of faculty members get the opportunity for research. The amount of Rs.3000 per project is too small to carry out serious research activity. This results in superficial treatment of the research work. Data gathered by such studies may either be insufficient, or poor in quality.

Thirdly, faculty members, particularly those teaching undergraduate students, have such a heavy teaching load that they hardly have time to think of conducting research.

Major Sources of Demand for Research Output

The two major sectors demanding research output are the government and international agencies. The various ministries, the National Planning Commission, the Rashtra (central) Bank, and other governmental agencies require policy related and feasibility studies. Likewise, the World Bank frequently utilizes results of feasibility studies before providing loan to a particular project. Other international agencies want projects conducted related to the various development programmes launched with their sponsorship.

III. Major Trends in Research

Nepal is preoccupied with finding the ways and means for raising the standard of living of her people most of whom are described as poor. Thus, the published works in economics mainly relate to the country's existing economic condition and planning strategies for the development of the various sectors of the economy. The purpose of this section is to briefly summarise the contents of the representative books and articles and to explain the contribution of economics to Nepal's development.

Shrestha, B.P. *An Introduction to Nepalese Economy. (1974)*

This is one of the first books on Nepalese economy which has been used as a textbook for undergraduate students. The author starts with a brief description of the country's power, mineral, forest, and population and human resources and explains the situation regarding transportation and communication and agriculture. The author elaborates also on the role of agriculture and land tenure system in Nepal. He gives an account of the recent land reform measures adopted and highlights on the problems relating to land reform. The book contains also a description of the co-operative movement in the country, historical development of organized industries, growth of cottage, village and small industries and industrial location and regional development. An account of foreign trade in Nepal with particular emphasis to Nepal-Tibet and Nepal-India trade is also given. The author explains the effects of dual currency system that once existed in Nepal. He gives an introduction to central and commercial banking in Nepal and sheds light on fiscal policy and public finance in the country. Finally, the author makes a review of economic planning and development in Nepal and presents a case for planning through Panchayat.

Pradhanang, A.L. *Nepalese Economics. (1962)*

At about the same time B.P. Shrestha got his first edition of the book, *An Introduction to Nepalese Economy,* published, Pradhanang also came out with his first book. Like Shrestha, Pradhanang also explains Nepal's situation in regard to agriculture, forest, mineral resources, industries, transport and communication, and irrigation and power. The book gives an account of Nepal's trade with foreign countries and also elaborates on foreign trade and status of tourism in the country. The book contains a note on the country's population and the extent to which family planning measures are adopted.

Singh, N.M. *The Principles of Planning. (1965)*

The author is a well-known economist in Nepal. He wrote this book for the purpose of introducing planning concepts to economics students in Nepal. Starting with the concepts of planning the author traces the origin of planning and explains about the types, features, needs for and the problems of planning. Outlined also are the conditions for successful planning. Portions of the book include planning under socialism and problems of allocation of resources in socialism. Other principal topics covered include planning by inducement, distribution of income and property, mobility of resources and social control of business. The author goes on to explain as to what planning measures can be adopted in controlling inflation and deflation, in making investments, in dealing with foreign aid, and in nationalization of business or industry.

Pant, Y.P. *Planning for Prosperity. (1957)*

At the time this book was written Nepal's First Five-Year Plan was about to be implemented. The basic objective of the book was to introduce the Plan. After giving a brief description of the country's economic resources the author elaborates on Nepal's early efforts for planning. The author then goes on to introducing the First Five-Year Plan. Explaining that development of the agricultural sector and land reform had included among the main objectives of the Plan, the author points out that industrialization and the role of small industries had also been emphasized. The book includes details also on financing and administration of the Plan and the problems of the public sector.

Pant, Y.P. *Planning Experiences in Nepal. (1975)*

Eighteen years after the publication of his book, *Planning for Prosperity*, the author wrote this book to account for Nepal's nearly two decades of experience with planning. The book begins with a general introduction to the country's economy and proceeds to give a brief description of the main features of the First Five-Year Plan (1956-1961), the Second Plan (1962-1965), the Third Plan (1965-1970), the Fourth Plan (1970-1975), and the Fifth Plan (1975-1980). In an analytic manner the author tells what the main strengths and weaknesses of each plan were. He explains that while the First Plan contained unspecific goals and directions improvements were made in each subsequent plan coming into grips with specific problems and setting more realistic targets.

Lamichhane, B. *Principles of Planning and Planning in Nepal. (1978)*

The book is intended as textbook for bachelor level students in economics and commerce. It can be classified into two parts. The first part deals with the principles of planning in general. It familiarizes the students with the concepts and types of planning and explains why planning is needed. Other topics covered are regional planning, problems in planning, techniques of planning, prerequisites of economic planning and characteristics of underdeveloped countries. The second part of the book concerns with planning in Nepal. The author gives a brief background information on the first three plans and discusses the fourth and the fifth plans in greater detail. The book is concluded with a review of planned progress in Nepal.

Theweatt, W.O. *The Concept of Elasticity and the Growth. (1961)*

This is one of the few books on economics written by a foreign national with reference to Nepal. The book emphasizes the role of capital in Nepal's economic development. After elaborating on two important micro elasticities and three micro elasticity concepts, growth equation, and the stages of growth analysis, the author makes an estimate of national income for Nepal for the period 1954-1960. Finally, the author explains about estimating capital requirements in Nepal during the preconditions and take-off stages of growth.

Pant, Y.P. *Problems of Development of Smaller Countries. (1974)*

As the title of the book suggests, the author presents his findings on the problems and prospects of development process in smaller countries of Asia, Africa, and Latin America. Of course, Nepal also is one of the countries covered by the book. After making a brief introductory remark the author describes the general structure of the economies in the developing countries, their transport development, government policies and domestic resources as well as commodity policy and marketing in those countries. The book also covers the preferential policies for manufactures and semi-manufacturers and the position of the developing countries in regard to external assistance. Toward the end of the book the author dilates on the economies of the landlocked countries and suggests strategies for their development. Finally, the author highlights the importance of regional economic co-operation and suggests general strategies for bringing development in the smaller countries of Asia, Africa, and Latin America.

Jain, S.C. *Poverty to Prosperity in Nepal. (1981)*

The author highlights poverty problem in Nepal and suggests programmes and policies for reducing its magnitude. By specifying the level of income which puts people below poverty line and the level of income above poverty line, he identifies the number of people who fall into these two categories. The author suggests two types of action programmes for the purpose of removing poverty and for leading the people to the path of prosperity. The first of these two strategies relates to the programme of additional income generation and the second relates to framing of policies to curb inflation.

Pyakuryal, B. *Problems and Strategies of Nepal's Economic Development. (1977)*

The author begins by presenting a gloomy picture of Nepal's economy in the light of rapid population growth, vanishing forests, soil erosion and so on and stresses the need for developing the agricultural sector for overcoming these problems. He feels that the sector so important for Nepal's economy has been neglected. Drawing the attention of the readers to some of the writings and suggestions made by foreign authors, the author offers his own suggestions which he feels will help in developing the agricultural sector in Nepal.

Wake, C.J. *BIKAS* (Development) *Evoluation in Nepal. (1980)*

The author looks at the changes that modernization has brought to Nepal with an anthropologist's eye. The book is divided into seven chapters the first of which traces out the political development in the country. Chapter II deals with the political and administrative processes while Chapter III gives an account of land use and agricultural development in Nepal's *terai,* hills, and mountains. In Chapter IV the author describes developments relating to cottage industries, co-operatives, public and private sector enterprises and tourism. Chapter V contains a description of educational scene in Nepal and Chapter VI explains the situation relating to health services in the country. The final chapter relates development with culture, elaborates on Nepal's family pattern, marriage customs, and gives a description of the ethnic communities and religious institutions in Nepal.

Pathak, S.R. *Some Thoughts on Economic Development in Nepal. (1981)*

A wide range of topics are covered in the book. First, economic development is defined in brief. Second, an explanation to the nature of underdeveloped areas is given. Third, such characteristics of underdevelopment persisting in Nepal as poverty, scarcity of capital, rapid population growth, unemployment, inefficient labour, and ineffective administration are highlighted. Fourth, political forces, economic forces, and socio-cultural forces are explained as the main forces stunting the development of Nepal. Fifth, the existing condition relating to agriculture, land reform, population problems, utilization of idle manpower, foreign aid, and tourism in Nepal is explained. Sixth, the features of the various economic plans of Nepal are outlined. Finally, King Birendra's efforts toward developing Nepal are highlighted.

Pradhanang, A.L. and P.B. Chhetry *Rural Development in Nepal. (1981)*

The writers point out the plight of the poor people in Nepal, particularly those living in rural areas. The income level of a large segment of population is miserably low. Majority of the people have no water faucets, toilets, and electricity in their own homes. The rural people are employed for only about six months a year. Participation of rural people in development activities is weak, wasteful, and inefficient. The writers assert that even though much money has been spent on uplifting the lot of the rural poor, virtually nothing has been accomplished. Offering their suggestions to reverse this trend they stress the need for every project to have such objectives as increase in productivity, employment, social services, and conservation of economic balance.

Contribution of Economics to Nepal's Development

Even though the contributions made by economics to the nation's development cannot be measured in quantitative terms they are quite significant. At graduate and undergraduate levels economics draws one of the largest concentrations of students. Economics graduates are now working in various capacities with the government and industries. Their decisions are certainly influenced by the type of education they have received.

The contributions of economics are reflected more obviously in the country's economic plans. From its inception, the National Planning Commission has been manned and advised by the nation's top economists. These economists have played an important role in shaping Nepal's development plans. Economic analysis has been playing increasingly greater role in decisions relating to projects and programmes being carried out both in public and private sectors.

IV. Problems of the Profession

In comparison with the status of economics teaching and research in developed countries Nepalese economics is in infant stage. As explained in the previous sections theoretical research is yet to be conducted. Even though an impressive number of applied research activities have been carried out in recent years activities relating to theoretical research are almost nonexistent. This and other problems relating to the profession are addressed below.

1. Research endeavours relating to theoretical concepts are generally lacking in Nepal:

At the risk of repetition, it is worth mentioning here that most of the research conducted so far is applied in nature. They have been directed more toward feasibility and evaluation studies. In order to formulate theoretical issues based on the empirical experiences of Nepal research on theoretical aspects is essential. At the moment university teachers and other economists rely on economic thoughts and issues developed in other countries. This has kept them at a distance from the realities of Nepal. Teaching done by such individuals has helped in producing only generalists rather than specialists in economics.

2. Interaction between teaching and research is nearly absent:

Most of the teaching is based on materials contained in the prescribed textbooks. Nearly all of these textbooks are written by American and Indian authors. Thus, the students end up spending most of their classroom time learning about the concepts written by the authors who are totally unaware of the situation in Nepal.

There are a few books relating to the economy of Nepal. Most of the available data are generated from policy related and feasibility and evaluation research. But the findings of these activities hardly get disseminated to the classrooms. This results in routine classroom activities making them uninteresting to students and less challenging to teachers.

3. Lack of incentives for faculty members to undertake research:

Even the opportunities to engage in feasibility and evaluation studies are available to only a small number of faculty members in the Kathmandu Valley. Obviously, these individuals are not involved in research in the areas they teach. The over-increasing cost of daily necessities have compelled them to get involved with any type of job that pays, be it part-time teaching or research. Moreover, faculty members rarely get encouraged from the university administration, their colleagues, or their students, to conduct theoretical or applied research.

As the country is struggling to wipe out poverty the government's main interest lies in applied research which will assist in expanding employment opportunity, in producing bumper crops, in bringing green revolution, in making human resources development and so on. The government does not seem to be interested in a research that does not show immediate result.

4. Faculty members do not seem to have sufficient time for research:

Undergraduate teaching faculty members have heavy teaching load. This leaves little time for research. Because most of them either ride a bus or walk to the college, much of their time is spent on commuting. They try to utilize any time saved in generating additional income working at a second place or tutoring the students privately.

5. General shortage of research manpower at Tribhuvan University, private campuses, and in research agencies:

Out of 162 faculty members now teaching under the Institute of Humanities and Social Sciences in the 23 campuses throughout the country only six hold Ph.D. degree. All six of them are concentrated in Kirtipur Multipurpose Campus alone. Most other teachers received their training in general economics with little or no exposure to research. It is too much to expect from them by way of meaningful scientific research.

A number of Ph.D. holders in economics are attracted to government positions. They find those positions relatively prestigious and financially rewarding. A prominent economist is now serving as the Minister for Financial Affairs and another well-known economist is Nepal's ambassador to a foreign country. A number of other experienced economists are in government service. Their duties are essentially administrative in nature so they hardly have time for furthering their area of training by engaging in research.

6. Job prospect for economics graduates is getting increasingly bleaker:

Traditionally, the government has been the single largest employer of economics graduates. Most of the graduates prefer government positions over any other positions for reasons mentioned earlier. Tribhuvan University is the second largest employer of these graduates. Most of its employees are instructional staff but a significant number of them are employed in research centres and in various administrative offices. Nepal Rashtra Bank is another employer of economics graduates. The other three banks, Nepal Bank, Banijya (commercial) Bank, and Agricultural Development Bank also employ a significant number of these graduates.

The graduates are engaged also in semi-government and private agencies. The Agricultural Projects Services Centre, Nepal Industrial Development Corporation, National Trading Limited, and Agricultural Input Corporation are some of the semi-government enterprises where job opportunities are available. In the private sector, economics graduates are employed in such areas as industries, service agencies, and research agencies.

As stated earlier, most individuals prefer government services. They are also happy to find employment with banks and semi-government enterprises. Perhaps the least preferred positions are those of college and university teaching. Only if they fail to secure jobs elsewhere do they seek teaching positions. Even after they have joined the teaching profession most of them actively seek better positions outside of the university system both within the country, or outside of it. The position of a teacher is not as prestigious as that of a government officer or a corporation officer. Teachers enjoy less fringe benefits and get fewer opportunities to travel abroad than their counterparts in government and corporate offices. These trends are not helping to further the development of economics as a profession. To reverse this trend it is essential to make teaching profession as attractive as other jobs by according it due prestige, and offering better pecuniary incentives.

Employment opportunities for graduates are getting scarce even in the university campuses. The Economics Department of the Kirtipur Campus is the single largest department to produce master level graduates. The number of these graduates is on the increase. This is because nearly all of the high school graduates who want to enter higher education stream can do so without having to appear in any further screening tests or entrance examination. This has resulted into a tremendous growth in higher education enrolment; more so in economics than in most other fields. Should this trend continue the country will soon have several unemployed economics graduates.

7. There are only a few professional organizations established for the purpose of developing economics as a profession:

Over the years a few professional organizations in economics cropped up but most of them have been inactive. At the initiative of veteran economist S.D. Pandey, the Economics Association was created at the Department of Economics of Tri-Chandra Campus. Currency Campaign Committee was founded by A.L. Pradhanang and M.N. Bista in view of declining value of Nepali currency against Indian currency. Another Economic Association was established by Y.P. Pant. B.P. Shrestha also founded Nepal Council of Applied Economic Research. All these associations operated with limitations of funds, manpower, publication facilities and so on. The Economics Instruction Committee at Kirtipur Campus is one of the few active professional associations. It publishes the *Economic Journal of Nepal* four times a year the purpose of which is to publish articles and research papers on economic and social problems facing Nepal. The *Journal* aims also at leading the readers forward through a literature on development economics and stimulating those concerned with economic development to form their own ideas from which productive contribution may follow. The *Journal* is meant principally for those who have concern over economic development of the poor countries.

8. Publication facilities are almost non-existent for articles, books, and research reports related to economics:

Some facilities for publication exist but proper environment to encourage professional writers and their publications is yet to be fostered. Only a few university professors engage in meaningful research activities because such activities are not a prerequisite to their promotion. Also the existing limited number of publishers of books and journals offer little or no remuneration to writers and researchers. The publishers have their own problems too. If they are non-government publishers they have to rely on advertisements to meet their expenses.

Some authors get their books published at their own expense. The local publishers occasionally publish some books on the economy of Nepal. In general, authors have a difficult time finding a publisher for their books. Articles in economics are published in such journals as the *Journal of Economics, Journal of Humanities and Social Sciences,* and *Tribhuvan University Journal*. In addition, other journals such as *Himalayan Economist, Kathmandu Review,* and *Vasudha* also publish articles on current issues and problems that confront the economy of Nepal.

9. One of the principal reasons as to why there has not been much research in economics is lack of demand for utilization of the research conducted:

Most often even the university financed projects are not "used" after their completion. Few government and university administrators have developed the habit of utilizing research on related issues in making their policy decisions. College and university teachers rarely take research findings to their classrooms. It is the researchers themselves who most frequently utilize research results for the sake of further research. Master's students go through related research for their theses, doctoral students do the same for their doctoral dissertations and so on. Some government ministries and international agencies get feasibility and evaluation research conducted. They utilize the findings in reformulating policies or for giving a new direction to the development projects under consideration.

V. Agenda for the Future

On the basis of an examination of the prevalent condition relating to the status of economics teaching and research in Nepal the following recommendations are made for the purpose of meeting the requirements in teaching, research and application as well as in meeting the country's needs for policy relevant research.

1. In order to depart from the tradition of producing general administrators it is important to orientate economics courses more toward quantitative analysis so that students are able to follow recent developments in the discipline, and also employ their skills in handling data.

2. Student participation in classroom instruction, particularly at degree level, is quite essential. The usual large classrooms should be reduced to manageable size and students should be encouraged to raise questions, present their papers, and participate in general discussions.

3. There is a need for interaction between teaching and research. Classroom course contents should be supplemented with research undertakings related to Nepalese situation so that the students are able to appreciate the practical problems which the country is facing.

4. While consolidating applied research it is essential also to create favourable environment for theoretical research.

5. It is suggested that a greater number of faculty members be encouraged to write textbooks and articles and to undertake both theoretical and applied research by providing them with such incentives and facilities as reduction in teaching loads, utilization of research, literature and library facilities, publication facilities, attractive remuneration for published works and so on.

6. There is a need for the establishment of additional professional organizations and making the existing organizations more active. Among others, the activities of such organizations should include frequent discussions on major national and international economic problems and issues facing the country.

7. In view of the fact that the country is striving for raising the standard of the general people it is suggested that the research endeavours of Tribhuvan University and private agencies be directed toward meeting the country's needs for policy relevant research. The five-year economic plans contain the major economic policies of the government. Research in economics should be directed to those policies.

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Appendix A

Economics Faculty Members in 24 Campuses of Tribhuvan University by Educational Qualification

Country of Training	*Degree* *M.A.*	*Ph.D.*
USSR	1	2
India	1	3
U.K.	1	-
Egypt	1	-
Nepal	147	1
Total	150	6

Appendix B

Graduate and Undergraduate Students in Economics

Campus	*1978* *Grad.*	*Under Grad.*	*Total*	*1981* *Grad.*	*Under Grad.*	*Total*
1. Mahendra Ratna Campus, Ilam		4	4		15	15
2. Mechi Campus, Bhadrapur		11	11		11	11
3. Dhankuta Campus, Dhankuta		-	-		11	11
4. Mahendra Campus, Dharan		-	-		19	19
5. Mahendra Morang Adarsha Campus, Biratnagar		58	58	182	222	404
6. Mahendra Bindeswari Campus Rajbiraj		52	52		32	32
7. Bhojpur Campus, Bhojpur		39	39		17	17
8. Ramswarup Ramsagar Campus Janakpur		65	65		54	54
9. Padma Kanya Campus, Kathmandh		197	197		124	124
10. Bhaktapur Campus, Bhaktapur		15	15		-	-
11. Tri-Chandra Campus, Kathmandu		451	451		278	278
12. Kirtipur Campus, Kathmandu	262		262		358	358
13. Patan Campus, Lalitpur		308	308		189	189
14. Birendra Campus, Bharatpur		52	52		-	-

Campus	*Grad.*	*1978* *Under Grad.*	*Total*	*Grad.*	*1981* *Under Grad.*	*Total*
15. Thakur Ram Campus, Birgunj		14	14		-	-
16. Mahendra Campus, Banglung		-	-		5	5
17. Prithivi Narayan Campus Pokhara		33	33	58	46	104
18. Tribhuvan Campus, Palpa		22	22		19	19
19. Mahendra Campus, Dang		12	12		9	9
20. Mahendra Campus, Nepalgunj		38	38		37	37
21. Doti Campus, Doti		25	25		5	5
22. Bhairahawa Campus, Bhairahawa		-	-		68	68
23. Ratna Rajya Laxmi Campus, Kathmandu		-	-		103	103
24. Saraswati Campus, Kathmandu		-	-		-	-
Total	262	1471	1733	598	1264	1862

Appendix C

University Research Centre and Private Research Agencies Engaged in Economics Research

Name and Areas of Research	Staff Name	Level of Training	Country Trained	Field of Specialization
1. Agricultural Projects Services Centre (APROSC)- Feasibility studies, socio-economic studies, appraisal of prepared projects.	Adhikari, R.	MA		Econon
	Aryal, P.	MA	India	Agri.Econ
	Banskita, K.	MA	Philippines	Econ
	Ghimire, D.	MA		Econ
	Gurung, U.B.	MA		Econ
	Mainali, B.K.	MA	Philippines	Econ
	Pandey, S.	MA		Econ
	Pant, T.N.	Ph.D.	USA	Econ
	Pokhrel, C.P.	MS	USA	Dev. Econ
	Poudyal, S.K.	MA	India	Agri. Econ
	Pradhan, L.	Ph.D.		Econ
	Rana, A.	MA		Econ
	Rawal, T.	MS	Philippines	Agri.Econ
	Risal, P.	MA		Econ
	Sharma, R.	MEC	Australia	Agri.Econ
	Shrestha, A.	MA	India	Econ
	Shrestha, A.M.	MA		Econ
	Shrestha, K.C.	MA		Econ
	Shrestha, R.R.	MA		Econ
	Shrestha, S.	MA		Econ
	Sijapati, B.B.	MS	USA	Agri.Econ
	Singh, D.M.	MA		Econ

Name and Areas of Research	*Staff Name*	*Level of Training*	*Country Trainde*	*Field of Specialization*
	Subedi, S.	MA		Econon
	Yadav, R.P.	Ph.D.	USA	Agri.Econ
2. Centre for Economic Development and Administration (CEDA) - Planning and Economic Policy, Rural Development, Population and Human Resources	Acharya, R.	MA		Econ
	Amatya, U.B.	MA		Econ
	Ansari, H.	M.Sc.		Econ
	Badgami, S.	MA		Econ
	Bajracharya, B.B.	MA		Econ
	Banskota, M.	Ph.D.		Econ
	Bhadra, B.	MA		Econ
	Chaudhary, T.	M.Sc.		Economic Planning
	Dhungana, B.	MA		Econ
	Kayastha, N.L.	MA		Econ
	Ojha, D.P.	Ph.D.	USA	Econ
	Pant, G.P.	MA		Econ
	Paudel, S.R.	MA		Econ
	Paudel, T.R.	M.Sc.		Econ
	Pokharel, T.P.	MA		Econ
	Shah, A.J.	MA		Agri.Econ
	Sharma, S.P.	MA		Econ
	Sharma, V.R.	MA		Econ
	Shrestha, N.	MA		Econ
	Urety, R.P.	MA		Econ
	Upadhyay, K.P.	MA		Econ
3. New Era-Feasibility study	Prasai, Y.	MA		Econ
	Vaidya, B.G.	M.Sc.	Philipplines	Agri.Econ

Name and Areas of Research	*Staff Name*	*Level of Training*	*Country Trained*	*Field of Specialization*
4. Integrated Development Systems (IDS) - Economic Planning	Bhandari, R.N.	MA	India	Econ
	Pradahan, N.	MA		Econ
	Risal, R.P.	MA		Econ/Econometrics
	Thapa, P.J.	MA	USA	Econ
5. Agro-Technical Development Consultant-Economic Development	Rauniyar, G.P.	MA	Thailand	Econ
	Silwal, B.B.	MA	Thailand	Econ
6. National Research Associates (NRA)-Socio-Economic, Feasibility & Evaluation	Regmi, R.	MA		Econ
	Rimal, N.N.	MA		Econ
7. East Consultant; impact studies of development projects, rural development, planning, feasibility	Banskota, M.	Ph.D.		Econ
	Bhadra, B.	MA		Regional Planning
	Shreshtha, R.R.	MA		Econ
8. Research Consult-Socio-economic	Shrestha, D.L.	MA		Econ
	Vaidya, S.	MA		Econ
	Vaidya, S.M.	MA		Econ

Name and Areas of Research	*Staff Name*	*Level of Training*	*Country Trained*	*Field of Specialization*
9. Economic Survey Services Centre	Amatya, D.	Ph.D	India	Econ
	Amatya B.	MA		Econ
10. Project Study and Analysis Centre	Banskora, K.P.	MA		Econ
	Lamsal, G.	MA		Econ (Manpower & Demography
	Regmi, S.K.	MA		Manpower Econ

FIVE

INDONESIA: *Sukadji Ranuwihardjo*

I. Brief History

Introduction of Economics as a separate discipline among social sciences in Indonesia is relatively new. It started with the establishment of the economics college in Ujungpandand (then named Makasar) in 1948, prior to the founding of full-fleged universities in Yogyakarta (Gadjah Mada University in 1949) and in Jakarta (University of Indonesia in 1950). In the colonial period, economics was offered as a supporting subject within the college of law and social sciences in Jakarta and was taught by Dutch professors. Until 1946, about a dozen Indonesians had studied economics in the Netherlands; five of them earned doctoral degrees, and yet none was working in academia. Only after 1950, those few Indonesians entered universities as pioneer professors of economics in the country. It is no wonder, therefore, that Dutch University system has its deep imprint in Indonesian system of higher education.

Economics as a discipline in Indonesia covers broader field than usually meant in the English speaking world. It includes economics proper, business administration or management (which is called business economics), accounting, agricultural economics, and lately also public economics as a variant of public administration. These studies are put together within the faculty of economics as departments or fields of specialization. Outside the faculty of economics, agricultural economics is also offered as field of specialization in the faculties of agriculture and some aspects of economics and management are also part of the curriculum of industrial engineering and political and social sciences.

Due to the importance of foreign aid especially of the Ford Foundation, and later on also of the USAID, the Rockefeller Foundation, and the World Bank, economics education began to be influenced by the American pattern, especially since 1966. Yet even today there is still unstructured mixture of pre-World War II Dutch system together with the US system in economics education.

A systematic institutional development (including organizational and curricular) in economics got its historical landmark in the fifties when University of Indonesia signed a co-operative agreement with the University of California, Berkeley, for the period of 1956-1964; a similar co-operation arrangement was later made between Gadjah Mada University and the University of Wisconsin for the period of 1958-1964. Both agreements were funded by the Ford Foundation.

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* The author expresses his gratitudes to Dr Tom Kissinger, the Representative of the Ford Foundation in Jakarta for giving access to the files at his office for preparation of this report.

While American professors stayed and taught for an average period of two years in Indonesia, a group of selected graduate students and teaching assistants were sent to the United States for further graduate work. These returnees later on became the real first generation of professional faculty staff in economics (of course including business administration, accounting, agricultural economics and public economics). But history decided differently. Those first generation economists especially in Jakarta, followed by the second generation are drawn heavily into the government as ministers or senior administrators and the like, so that their involvement at the university become severely limited.

The establishment of provincial state universities in the sixties (which today numbers 42,including teacher training colleges or institutes) resulted in the recruitment of graduates of either University of Indonesia or Gadjah Mada University as their faculty in economics. Thus, it is the institutional development at the University which set the tone of economics education in Indonesia in the sixties and the early seventies. 1/

Economics in Indonesia has not gone through a smooth path of development. It suffered an episode of discontinuity in the sixties, 2/ when political atmosphere was very suspicious against economic theories coming from the West, namely those releated to the capitalistic system. Economics teachers were held suspect for educating students on subversive subjects that were regarded as incompatible with the state policy. While sending graduate students to western countries was not completely banned, their study programmes were revamped into more technical subjects such as statistics or production management. Library acquisitions on economics from the West were also not completely prohibited, but were getting more and more difficult. This period of vacuum, however, was not filled by another brand of economic theories such as socialist or Marxian theories, or even propagation of indigenous theories of the economic system. The vacuum, in fact, gave large opportunities for more technical aspects of economics, especially in business administration and planning or input-output analysis, yet somehow they never got the time to institutionalize themselves into a strong corps of experts.

Events after 1966 revived the strong development of economics, including agricultural economics. This was also partly due to the policy of some donor agencies, that retreated from supporting programmes in business management and accounting. They considered them as professional education which was irrelevant for national economic development strategies. This view is apparently wrong because the process of economic development in developing world needs army of economic managers at the level of industries, and the society badly needed them.

Since government fellowships for foreign studies were very limited or next to none, there had been cases that faculty members possessing MBA degrees had to switch into economics just to be able to earn Ph.D degree abroad as partial requirement for their job promotion.

Upto the seventies, majority of high professional economists in Indonesia consisted of those who had received their education outside the country, mostly in the United States through the financial support from agencies such as the Ford Foundation, US-AID or the Rockefeller Foundation. Some donor agencies also granted fellowships in economics in neighbouring countries like Thammasat University in Thailand and the University of the Philippines in Quezon City. Masters level economics education earned by young faculty members in these countries usually served as a springboard for Ph.D in the United States at a later stage.

The surge of provincial university development attracted other countries for giving financial and other aid. Australia and the United Kingdom have been very active through the Colombo Plan programme, followed by Belgium (in economics and business administration at master's level), the Netherlands, Japan, and France.

Until 1980, domestic education had been always an unstructured melange of the prewar Dutch and American systems. The curriculum came in a package; the students had to take examinations in all the subjects included in it. Very few subjects were offered as optionals. These choices were only available at the later stages of *Sarjana* level (the fourth or fifth year of the five-year programme). Other branches of social sciences, like sociology and positive law of Indonesia, were compulsory parts of the package. Elected courses outside the core subjects of economics were almost unavailable.

This situation probably is partly responsible for the economics graduates in Indonesia not being ready to deal with aspects of policy issues having ramifications much broader than proper economic rationale alone.

Some initial measures had been devised to alleviate rigidities between faculty walls at least within the complex of social science faculties. The effects will, however, have to wait still for some time to be fully felt. It is worthy of note, however, that agricultural economics has been far ahead in integrating other related social sciences. Unfortunately, only few students opt for specialization in agricultural economics, however.

With increasing sophistication of quantitative economic analysis, the role of mathematics and statistics is getting progressively important. The level of understanding of mathematics and statistics needed in economics education nowadays is much higher than in other social sciences; even higher than disciplines like medicine, pharmacy, animal husbandry or agriculture. Economics graduates are also experted to possess competence in the use of computers.

The unstructured mixture of prewar Dutch and American systems was not confined to economics alone. Other disciplines that were alien to the American system were organized along the Dutch pattern. Many universities, including several economics faculties, used old nomenclature for their stages of education: *propadeuse* for first year students, *candidat* for undergraduates, and *doctoral* for graduate students. All graduates of a five-year programme are called *doctorandus* (abbreviated as *Drs)* a degree known only in the Netherlands and its colonies, meaning doctor minus thesis or dissertation. Graduates of the Faculty of Economics, of the University of Indonesia have dropped their *doctorandus* degree since 1967 in favour of *Sarjana Ekonomi* (abbreviated: *SE*).

In 1949, Gadjah Mada University developed *Baccalaureat* System, a three-year programme of tertiary education which was also adopted later by other universities. Graduates of this programme are called *Baccalaureus.* With the intervening events in later years, people abbreviate their degree with *B.A.* or *B.Sc.* or *Sarjana Muca,* imitating degrees of similar sound from the English speaking world. *Doctorandus* degree has never been formally promulgated in any legal system, while *Baccalaureus* (no abbreviation) was formally regulated in the Government Ordinance No. 37 or 1950. Indonesian degree of *Sarjana* (after a five-year programme) and *Sarjana Muda* (after a three-year programme) is formally inacted in the Law of Higher Education of 1961.

Since people inadvertently equalize *Baccalaureus* with Bachelor of Arts or Bachelor of Sciences in the American system, the graduate of a five-year programme *(Sarjana)* was automatically equalized with Master of Arts (M.A.) or Master of Science (M.Sc.). This view has been formally adopted by the Government, through their salary scales for civil servants, in which holders of *Sarjana* degree (generally call themselves *Doctorandus)* receive the same amount of salary as those who hold Master's degree from any country outside Indonesia.

The case of university degree recognition has raised problems and difficulties because the Government regards them as the main if not a sole criterion for salary determination of civil servant. The confusion of this degree recognition has also created unfavourable impact on man-power development at universities.

In June 1979, the Minister of Education and Culture implemented a fundamental reform in the higher educational system in Indonesia. There are three levels of tertiary education similar to the French system:

STRATUM 1 (S_1)	is a four-year programme. The graduate is called called *Sarjana*. The former three-year programme of *Sarjana Muda* or *Baccalaureus* was abolished.
STRATUM 2 (S_2)	is a one and a half to two-year programme after S_1. This level is supposed to be equivalent with Master's. The graduate is called *Sarjana Utama* (post sarjana). It is designed as a first stage research degree, especially for academic staff at the universities or research institutes.
STRATUM 3 (S_3)	is a full-fledged doctoral education. This programme also takes one and a half to two years to complete.

The planning stage of the reform took several years before it was formally announced in June 1979 and to be effective in 1980. Since it is very new its institutionalization will probably need several years to be really effective.

Coming together with this reform, there is also a new undergraduate non-degree programme in business administration and accounting. This is designed as a two-year education after secondary school, without any possible link-up with other degree programmes (this is popularized as S_0). Its objective is to produce low-middle skilled worker in administration. Several faculties of economics have started with this programme. The success, however, is still to be observed carefully in the coming years.

Bogor Agricultural University pioneered the S_2 programme in 1977 and produced its first graduates including in agricultural economics, while Gadjah Mada University produced its first S_2 graduates in November 1982.

As for doctoral education there are two co-existing systems: one has been the left-over of a much older system from prewar era. This system requires a graduate of the five-year programme to write a thesis through independent study with casual consultation with the appointed supervising professor(s). A doctoral degree will be conferred on the candidate upon satisfactory public defense of his/her thesis. It is the predominant style of obtaining doctoral degree in the country. Only the faculty of economics at the Gadjah Mada University starting in 1977, and at the Agricultural University in Bogor in 1978, ventured a full course-work Ph.D programme in economics. This is in conjunction with the new system of S_3 with up to three or four semesters course work plus successful qualifying examination and writing a thesis under full supervision.

Until the new system will be well established, probably several more years to come, economics education at Master's and Ph.D levels will depend heavily on foreign study. Advanced degrees for faculty staff will be of great importance for improving the quality of education and the level of professionalization of economics in Indonesia.

II. Economics Teaching: Present Position

There are 26 faculties of economics of state universities, in addition to Agricultural University in Bogor which also offers degrees in agricultural economics and Bandung Institute of Technology that teaches some aspects of micro-economics and management in its department of Industrial Engineering. In the private sector there are hundreds of economics faculties and "academies" that typically offer undergraduate programmes in business administration, or management and accounting. Only few of them offer programme up to *sarjana* level (five-year programme).

Among private institutions that offer programmes in economics and business administration-cum-accounting and meet minimum standard criteria set by the Ministry of Education and Culture are:

1. Universitas Kristen Satya Wacana - Salatiga (Central Java)
2. Universitas Katolik Parahiangan - Bandung
3. Universitas Kristen Indonesia - Jakarta
4. Universitas Katolik Atmajaya - Jakarta and Yogyakarta
5. Universitas Islam Indonesia - Yogyakarta
6. Universitas Islam Bandung
7. Universitas Surabaya
8. Universitas Taruma Negara - Jakarta
9. Universitas Trisakti - Jakarta

10. Universitas Krisnadwipayana - Jakarta
11. Universitas Nasional - Jakarta
12. Universitas Kristen Nomensen - Medan
13. Universitas Jayabaya - Jakarta

Through a ministerial regulation, private institutions are ranked into three categories:

(i) registered: it is the lowest rank under which all examinations are conducted by the government through an appointed committee normally comprised of faculty staff from the nearest state university.

(ii) recognized: institutions under this status conduct their examinations under the supervision of the government through the above mentioned committee.

(iii) equalized: it is the highest rank in which private institutions have full autonomy in conducting their own academic matters.

Educational Profile in Economics (1982)

A. Economics Faculties of State Universities:

1. Out of 26 faculties of economics there are

   26 departments of economics

   26 departments of business administration

   11 departments of accounting

   3 departments of agricultural economics (including Agricultural University in Bogor)

   1 department of public economics (at the University of Indonesia in Jakarta)

2. Faculty members (full-time):

   Total staff: 1519, in which

   27 full professors

   161 senior lecturers

   601 lecturers

   730 instructors, associates and assistants

3. Educational background of faculty staff:

(i)	Sarjana (graduate of a 5-year programme)	:	1260
(ii)	Sarjana + domestic Master's	:	32
(iii)	Sarjana + Foreign Master's	:	129
(iv)	Foreign Master's	:	11
(v)	Ph.D	:	87

In addition to those who are working at the universities, there are estimated 100 holders of Master's and Ph.D degrees working at ministeries, banks, and research institutes.

4. Student body:

Total : 30,601

Sarjana Muda (undergraduate)	:	21,052
Sarjana (graduate)	:	9,225
Domestic Master's	:	218
Doctoral programme (domestic & foreign)	:	106
		30,601

Out of the student body there are 21,919 (or 71.63%) male, and 8,682 (or 28.37%) female students.

On departmental classifications:

24.7% of students in economics

55.5% of students in business administration

18.1% of students in accounting

1.7% of students in agricultural economics

In the last three years on an average 1000-1100 new *sarjana* graduates have been annually produced by faculties of economics of state universities; about 30% of which were graduate of either the Gadjah Mada University of the University of Indonesia.

In addition, around 100-150 *sarjana* were produced annually by private institutions. It is estimated that the total of 8,000 *sarjanas* in economics, business administration, and accounting have been produced in the country so far.

Due to high population growth in Indonesia after World War II, and also the rapid progress in mass education after independence in 1945, the demand for tertiary education has been accelerating fast, especially after 1966. For the period 1976-1980, the demand to enter state universities has increased from 98, 878 to 291,795 or an increase of about 300 per cent. The demand for places in faculties of economics of state universities over the same period has increased from 15,922 to 32,741 or an increase of more than 100 per cent in five years.

The average annual intake of students in these faculties is 5,500, and up to 1981 there has been a limited increase of 7.5% annually. For this reason therefore, the admission ratio has dropped from 20% in 1976 to 16% in 1981.

Student candidates who are not admitted in state universities end up in private institutions. State university is always a preferred choice due to better quality of teachers and other facilities such as library and laboratories; they are also less expensive than private education. Tuition fees in public universities run between Rp. 30,000 - Rp. 50,000 (or equivalent to US$45 - US$75) annual (for two semesters), while private institutions charge up to Rp. 300,000 (equivalent to US$430).

5. Training/Specialization

In early 1950s when Professor Sumitro Djojohadikusumo was dean of the Faculty of Economics at the University of Indonesia in Jakarta, he took initiative to formulate a policy guideline on what kind of economist to be produced in Indonesia to meet the societal need of the time. He thought that an Indonesian economist should be "a generalist with limited specialization". The rationale behind the policy was to produce graduates as quickly as possible to meet the ever pressing need to fill the big gap in the government bureaucracy as well as in the private sector of a very young nation.

At the end of 1960s the Minister of Education and Culture set up consortia on major scientific disciplines to serve as advisory boards to the Director-General of Higher Education. These consortia are responsible for setting up minimal standard criteria of acceptable quality and minimal standard package of programmes. The economics consortium was very much under the influence of three major faculties of economics, i.e. University of Indonesia, Gadjah Mada, and Hasanuddin in Ujungpandang. The policy of an "economics generalist with limited specialization" has been continued, although it has been questioned in some quarters of the academic community, because the need for professional specialization is increasingly felt. This may be part of the reason why recently people question the readiness of Indonesian Economics graduates to immediately assume responsibility in their employment. The question also concerns with their capacity to do serious research work on particular issues.

Since the educational system in Indonesia from primary on to tertiary level is under direct control of national government and the role of consortia in all major scientific disciplines (there are eleven of them all) as advisory-cum-executive boards under the Director-General of Higher Education, the curriculum set up at any level including at the tertiary one is generally very uniform. Only major universities (in case of economics, only the University of Indonesia and Gajah Mada) can offer more elective courses over and above the present package curriculum imposed by the Ministry through the consortium.

State universities are fully funded by the national government. In some cases provincial governments also set aside some of their annual budget for contribution to state universities located in the province. Tuition fee collected from the students normally amounts to 7-8% of the annual operating cost of the university; it is reverted to the government treasury. Faculty budget forms part of the university's budget; the annual allocation for the faculty is determined by the university administration and faculty deans. The annual budget does not include faculty salary as this is directly controlled by the government treasury; university staff, both academic and non-academic, are civil servants in Indonesia. The university (or the faculty) does not control personnel budget. It receives its annual allocation from the Ministry of Education and Culture according to which the number of staff (academic and non-academic) can be recruited in a particular budget year. Salary increase is determined nationally. New recruits are put on a provisional status up to the maximum of two years. After that, if there is no major reason for not continuing his or her employment, he or she will get a permanent status, in which position he continues until he reaches the retirement age, of 55 (for the non-academic staff), of 65 (for the academic staff). A full professor may be requested to stay until 70 years of age in active duty although his mandatory retirement age is 65.

Out of 26 faculties of economics in 1982, 13 reported of having access to computer facilities within their respective universities, 9 others had statistical laboratories, and 3 had accounting laboratories.

Typical economics library in Indonesia has about 90% of materials in English and 5-7% in Indonesian. The rest are in other languages such as Dutch, German, French, and Japanese.

While the language of instruction is Indonesian, the students, especially in later years, are supposed to be bilingual, having competence in English (which is officially adopted as the second language). Expatriate visiting professors are expected to lecture in English or Indonesian. Undergraduate students can take their examination in Indonesian language; while graduate students are expected to read advanced materials in English. The English language requirement is a serious constraint for many students. Normally, the faculty offers a two semester remedial course in English (after six years background of English at the secondary school), yet the average English proficiency of the students (and sometimes also of the junior staff) is relatively poor.

In 1982, it was reported that there were 61,209 titles and 187,631 copies of economic materials in state university libraries of which 33.5% of the titles and 38.96% of the copies were located at the University of Indonesia and the Gadjah Mada University.

6. Post-*Sarjana* Programme (S_2 and S_3)

After the 1979 reform, Gadjah Mada launched a post-*sarjana* programme (S_2) in economics and business administration. The two-year programme after *sarjana* is designed for junior staff from provincial universities. In 1983, the University of Indonesia started a similar programme 3/. For the coming five to ten years the S_2 will be focussed on improving the quality of academic staff both in the public as well as the private universities. On account of very limited number of foreign fellowships available the S_2 and S_3 will play a very strategic role in the future.

Before the doctoral programme under S_3 was formalized in 1979, Gadjah Mada University pioneered a full-fledged doctoral course work in 1977, with partial financial support from the Ford and the Rockefeller foundations and with the participation of visiting expatriate professors. This programme includes a 2-3 semesters' course work with qualifying examination at the end. A successful candidate writes a thesis under the supervision of an appointed committee.

Precursors of post-*sarjana* programmes in economics were varied in their design:

(i) Workshop on Agricultural Economics at Gadjah Mada University (1968-1974). It was a one-year certificate programme which was originally meant as a refresher course in economic theory and quantitative analysis, and an introduction to agricultural economics as a separate discipline. Integration of others social sciences in this programme was quite successful. At a later stage it was felt that a one-year period is much too short to meet the objective. Those who wanted to study further for doctoral degree had to go somewhere else. This was partly the reason why the programme was discontinued, more so when the Agricultural University in Bogor started to offer formal degree after *sarjana*. The Ford Foundation and the Australian-Asian Universities Co-operation Scheme (AAUCS) provided partial funding for the programme.

(ii) National Planning Programme (PPN) at the University of Indonesia was started in 1972 and is still in operation. This is also a one-year certificate programme. It is designed for wider group of participants covering junior staff members of universities and also technical staff of regional planning offices, officials of various ministeries, and of banks. The curriculum is designed to be more "practical", which includes project evaluation techniques, principles of feasibility studies, etc. The Ford Foundation has been the co-funder of this programme.

(iii) "Magister" programme at IPB (Bogor Agricultural University) was started in 1973 with partial support by the Ford Foundation and the Agricultural Development Council. It was a pioneer in formal education after *sarjana* degree. It has changed however, in early 1983, into a new Indonesian nomenclature of *Sarjana Utama*.

After vigorous implementation of the educational reform of 1979, all post-*sarjana* programme in the country are organizationally regulated by the Director-General of Higher Education, while the individual institutions still hold some autonomy in developing the curriculum. The reforms will need some more years to create real strong post-graduate studies in economics in Indonesia. It is bound to play a very important role in improving teaching and research in economics in Indonesia. Although fellowships for foreign study will be available, yet the number will be very limited to be able to cope with a huge problem of education in a very populated country like Indonesia. It is therefore, necessary to strengthen national infrastructures of teaching and research in economics.

B. Economics Education in Private Institutions

In almost every big city in Indonesia, especially in places where there exist public university, normally there are crowds of private institutions coming-up from vocational tertiary education (trade-schools, or academies) up to full-fledged universities. They take advantage of being close to better organized public institutions,from which they can hire academic staff as part-time instructors. The arrangement is of mutual benefit as it gives additional income to very low-salaried academic staff and make their services cheaply available to the private institutions which cannot afford full-time staff of qualified people. These private institutions normally operate in the afternoon or evening hours so that academic staff from public institutions can work in after-office-hours.

A sample of eight relatively good institutions is picked up for illustration. These institutions are:

1. Universitas Kristen Satya Wacana, Salatiga (Central Java)
2. Universitas Trisakti, Jakarta
3. Universitas Islam Indonesia, Yogyakarta
4. Universitas Kristen Indonesia, Jakarta
5. Universitas Islam Bandung
6. Universitas Taruma Negara, Jakarta
7. Universitas Jayabaya, Jakarta
8. Universitas Pancasila, Jakarta

Except Universitas Kristen Satya Wacana, which offers economics as well as business administration, other universities typically offer only business administration and accounting. Normally, there are very few full-time staff members (again, except Universitas Satya Wacana which has a strong core of full-time staff) and they depend very heavily on part-time academic staff drawn from public institutions and other research institutes in the town. In the last two years, the government appointed full-time junior staff (with full salary paid by the Government) and assigned to teach full-time at private institutions as one form of government subsidy. Yet their number is very small to enhance capability of self sustaining development of the institution.
It is hoped that the Government assistance of this kind, along with other budgetary subsidies, will increase substantially in the near future.

Due to very limited place available at public universities, private institutions play an important role to partially meet the unsatiable demand for higher education. They even have to conduct entrance examinations to screening the candidates for the limited seats available with them. While public university works on government budget, the private ones have to raise their own resources. Their tuition rates, therefore, are 10 times as high as of public universities, and yet they have poor library facilities. The best ones among private universities the stock of books on economics ranges between 1200-1500 titles with copies varying between 4000-8000, for student body of an average size of 1800 (the range being from 610 to 4230).

Out of eight institutions four reported to have small computer facilities, five have laboratories in statistics, and four have accounting laboratories.

While private institutions are classified in three categories (registered, recognized, and equalized) and the control and evaluation usually is entrusted to the nearest faculty of economics of a state university, they just duplicate the curricula of state universities.

In this kind of environment, private institutions are normally in less favourable condition than state universities. But it will be wrong to conclude that all private institutions are worse than the public ones. Private faculties in big cities in Java are much better than their public counterparts in the other islands; where they have recently been started and where facilities, including staff members, are quite limited.

In their important role to meet partial demand for higher education alongside of the state universities, private institutions have to become an integral part of higher education in Indonesia. Government assistance for their development will go a long way to solve one of the very pressing social problems in the country.

III. Major Trends in Research

It has been very difficult to make a clear-cut distinction between institutional research programme and major trends in research conducted by economists in the country. Research budget at the university allocated through the Ministry of Education generally is still very small of around 3 to 5 per cent of the total annual budget. The university, in turn, has to divide this small cake amongst all the faculties and departments through some rational procedure; ultimately only one or two research proposal(s) from each faculty or department are really funded at the average allocated portion of Rp. 300,000 - Rp. 500,000 (or equivalent to $450 - $700). Since the approval ratio with respect to total proposals is relatively low, term or multi-year research proposals tend to be very difficult to be funded. It is very difficult to judge the quality of institutional research activities, since no well-established system of dissemination exists at the moment. Normally research reports are mimeographed as part of casual faculty publications with unsystematized distribution. Very few of these reports end up in professional journals.

Occasional informal seminars are organized within the faculty to review research reports conducted by its members. This hopefully becomes the first step of peer-review for improving quality. These activities, however, are confined only to a few relatively strong economics faculties.

Some portion of the university budget for research sometimes is allocated to junior staff to let them gain practical experiences in research. In these cases the results do not matter very much, while emphasis is put on the methodology and procedure.

External donor agencies that contribute partial funding for institutional research usually require some minimum acceptable quality. Since research activities tend to cluster at well-established institutions, the latter are the recepients of extra-budgetary support for research. It must be said, however, that institutional research is not financially rewarding to individual researchers. Even if it gives some additional income, it is only a temporary measure for a few months. Faculty members, therefore, prefer a more stable and continuous additional source of income through teaching in private institutions, which could be done in afternoon or evening hours.

Outside larger fundings are available in the form of commissioned research offered by government ministries, provincial governments, state enterprises, banks, etc. The surge of commissioned research began in 1978 as the start of the third five-year plan (*Repelita III)*. All ministries created special cells or agencies for research and development. The government annual budget for R&D objectives runs up to hundreds of billion rupiahs. A substantial portion of it is disbursed as research contracts to universities. Intangible benefits of these activities are several. Many of the projects will never be conducted in the first place without the contract. Faculty members who are involved in the process educate themselves on relevant issues of developmental problems of the country, and in turn will improve the content of their teaching materials. While commissioned research is generally policy-oriented seeking answers for short-term pressing issues, it has raised some tricky problems. Research agenda planned by bureaucrats at R&D agencies for their annual budget are not always consistent, relevant or well defined. Proposals are required to be submitted in October, contracts should be signed in May and reports should be delivered in March (at the end of the budget year). Control is focussed on the process and not so much on the quality. All these bureaucratic procedures may distort the original goals of research activities. While commissioned research is financially more lucrative than institutional research there is growing a strong feeling that universities orientate too much on contracts and not on scientific interests of their staff. Quick researches and surveys follow simpler methodology and are easy to implement. Long term, structural and macro problems that require heavier theoretical and analytical input receive low priority in commissioned research. This is probably also because busy bureaucrats have no spare time to digest sophisticated reports. As a consequence, there is little scientific development of the discipline in the universities. Moreover, since most research reports are prepared for the government departments they are not generally available for discussion and review to the colleagues. There is a general feeling 4/ that commissioned researches are usually of low scientific quality and are not worthy of publication. On the other hand, it is also recognized, that research capabilities are not nationally well distributed. Government research funds are also meant to improve this research capability as an institutional building project over and above what have been allocated through annual university budgets.

From the research producers side namely universities, complaints also abound: why their reports are only stacked at ministerial offices as dust collectors? To read all the reports will take a lot of time; and there are not always enough officials to study them, and not all are able to utilize the findings in policy making.

Dialogues between research producers and the government are often conducted at different wave lengths. The scientists insist on direct deployment of their "theory" or implementation of their suggestions based on their research findings. The government argues that policy decisions have to take several variables (mostly non-economic and at times even non-rational) into consideration while formulating policy. That is why the research content is not easily recognizeable in a policy decision. Furthermore it should be admitted that research recommendations, especially in social sciences are not always impartial. They implicitly contain value-judgements of the researcher and thus promote some ideological predilections and commitments. This makes the dialogue between research scientists and the government rather difficult.

Non-thematic, topical, and quick researches through the government contracts, no doubt, give insights into real developmental issues of the country they hinder intellectual advancement at the universities. Research proposals that originate from genuine faculty interests, but are seen as not of immediate practical import, suffer from lack of funding support. Those scholars with theoretical bent indulge in speculative thinking or in the analysis of available secondary data to formulate theory 5/. These speculative thoughts are generally very much influenced by fashionable topics of the time such as national economic system, economic development strategy, problems of poverty and income distribution, rural-urban development gaps, etc. While these are healthy indicators of the sensitiveness of economists on the societal problems, their outcome suffers from lack of objectivity and depth. The subject is treated at the so-called "socio-philosophical" level, and the write-up consists of generalities without proper empirical backup. Articles of this kind that appear in social science journals, and in daily newspapers, are journalistic in character, and do no good to the science of economics.

Sceptical attitudes against the effectiveness of macro-economic policy in developing countries like Indonesia raised by Indonesian as well as foreign economists have not encouraged serious research in this particular field. Government's monetary and finance policies in the last decade show the poverty of contribution that country's economists have made. Increasing prices of commodities under the government control such as petroleum is one example of an economic crisis. To reduce huge government subsidies for petroleum products, the price increase has never been under 30 per cent. This was followed by "price adjustment" in public utilities by almost the same magnitude. Devaluation in November 1978 was at a striking 50 per cent which greatly disrupted monetary and price balances. Credit policy has been predominantly based on administrative decisions rather than on market processes. The same is true in the sectoral development of agriculture, industry, and trade. It is always argued that the strategic goal of the government economic policy is long-term institutional and structural development, and this can be more effectively achieved by law and regulation than by conventional macro-economic policy instruments which mainly focussed on short-term changes.

It was not realized, especially by foreign economists discussing Indonesian economy, that basic ideological principles of the Indonesian economic system are quite different from any brand of capitalism of the West.

Although after 1966 the private sector (including foreign corporations) has played an important role in the Indonesian economy, the government still holds strategic leverage in economic decisions that are not always based on spontaneous market processes.

The following discussion illustrates some trend in economic research in Indonesia for the period of 1976 to 1982. It is based on four major publications, i.e.

1. *Ekonomi dan Keuangan Indonesia* (Economy and Finance in Indonesia), a quarterly bi-lingual journal published by the Indonesian Economic Association.

2. *Bulletin of Indonesian Economic Studies*, a four-monthly journal published by the Australian National University, Canberra.

3. *Agro-Ekonomika*, a four-monthly journal in agricultural economics (in Indonesian) published by the Indonesian Agricultural Economic Association.

4. *Prisma*, a monthly magazine in social sciences (in Indonesian).

There are 168 articles in *Prisma* dealing with economic problems and general issues concerning socio-political aspects of the Indonesian economic system, strategy of national economic development, problems of poverty and social justice, urban and rural dichotomy, food, nutrition, demography and employment, north-south dialogue, energy, etc.; 81 articles (48.20%) were written by economists, 17 articles (10.10%) by sociologists and political scientists, 9 articles each by agriculturists and engineers (10.70%) and the rest (14 articles or 8.34%) by lawyers, anthropologists, geographers, physicians, statisticians, and veterinarians. Out of 160 articles, 38 were written by foreign scholars (22.62%). Since *Prisma* is an interdisciplinary journal it is difficult to isolate purely economic research papers from the rest.

Over the same period of time, 102 articles appeared in the *Economy and Finance Indonesia (EKI)* and 88 articles in the *Bulletin of Indonesian Economic Studies (BIES)* that may be regarded as writings of professional economists. Out of *EKI* articles, 68 were written by Indonesians, 31 by foreign scholars, and 3 were by Indonesian jointly with expatriates. From the *BIES* publications, 14 were the work of Indonesians, 68 of foreign scholars, and 6 were joint articles.

A review of 147 other articles published elsewhere suggests following distribution: 32 (21.75%) deal with macro-economics, and the rest with aspects of micro-economic problems. Out of 32 macro-economic articles, 14 are the work of five Indonesian economists. Very few Indonesian economists are interested in the macro-economic research.

A review of *Agro-Ekonomika*, an agricultural economic journal reveals some interesting results. During 1978-1982 (there was lapse of publication in 1976 and 1977) a total of 68 articles appeared in the journal of which 61 articles were written by Indonesians, 6 by foreign scholars, and one was a joint work of an Indonesian and a foreign scientist; 31 articles (45.705) deal with the social structural aspects of rural communities, including co-operative movement, government policy on rural development and behavioural changes of peasant communities in the process of economic development; 9 articles concern with technical agriculture; 5 articles (7.30%) with regional or provincial issues; 7 articles (10.30%) have no direct relationship with agriculture; only 16 articles (23.50%) contain micro-economic analysis on agricultural problems.

In the 1970s there has been notable progress in the improvement of data base in Indonesia. The Central Bureau of Statistics should be commended in this regard. They publish series of censuses in population, industry, agriculture, and national sample surveys. The Bank of Indonesia's financial statistics and also the statistical appendices of annual budget proposal to the parliament (*Nota Keuangan)* have improved substantially in the last few years. This data improvement, however, has not yet affected the quality of research to any significant extent.

The primary product of systematic economic thought is the writing of essays. But such thinking and writing is not the monopoly of economists alone. These essays interpret social realities and offer ideas to transform them. But the essay "is more commentary than information, more interpretation than fact, more reflection than hard evidence about the topic, more creation than erudition, more postulation than demonstration, more opinion than dogmatic affirmation." 6/ Since the essays do not attempt to give conclusive proof of a hypothesis, people do not consider them as research papers.

In the last ten years some progress has been noted in the field of agro-economic survey, regional economic survey and socio-economic survey. Demographic institutes of the University of Indonesia and of Gadjah Mada, faculties of economics of Andalas and Satya Wacana, Bogro Agricultural University, and the National Institute of Economic and Social Sciences (LEKNAS) have been among the most active in the field. 7/ Researches jointly carried out with foreign consultants and Indonesian scholars in quantitative macro-economic planning models under the auspices of the National Economic Planning Agency (BAPPENAS) and the studies on the impact of economic development done at the Ministry of Finance have restricted distribution. The same appears to be true with regard to research conducted in Indonesian by international organizations like the World Bank and the International Monetary Fund (IMF).

In this connection it should also be noted that in more specific fields like low-cost housing, irrigation, urban renewals, etc., there have been contributions from specialists other than economists. A new trend towards interdisciplinary orientation studies is noticeable.

IV. Problem of the Profession

Well-trained economists in Indonesia are still relatively few. Almost all of them are returnees from graduate studies abroad, mostly from the United States. Those who are working in academic institutions are clustered in a few universities, especially at the University of Indonesia and Gadjah Mada University. Senior staff is inducted into the government so that their real contribution to education is seriously hampered. Those who are not working in education are scattered among government ministries and are heavily loaded with executive responsibilities. Only economists at the National Planning Agency (BAPPENAS), at the Ministry of Finance, and at the Bank Indonesia (the Central Bank) have some substantial portion of their time for research, usually in co-operation with foreign consultants. Indigenously produced economists, who pursue the academic profession, still need further education to enhance their technical capabilities in research. Few of them have excelled themselves as good research workers. Because of low salary of civil servants and uncertainty of research funding either through the university budget or commissioned research, most faculty members spend more time teaching outside their own institution for additional income. This leaves them with little time to concentrate on research.

There have been attempts to write economics textbooks in the last five years. Earlier economics textbooks, published in the sixties, were translations of standard English or Dutch economics textbooks. Nowadays Indonesian economics textbooks use Indonesian economic data for illustration. This enhances the relevance of economics education and familiarizes the students with national economic problems and situation. Students can pass their undergraduate examinations solely through materials in the Indonesian language. Graduate students are supposed to read materials in English for their examination while Indonesian is the only language of instruction at all levels; however foreign professors use English in their lectures. The major problem concerning educational materials in Indonesia is that the price of books is far beyond the reach of average students; this is more so for imported publications. Junior staff generally cannot afford to buy books for their personal library, they have to depend completely on limited copies available in the library.

Since the official ban of Marxian teaching in Indonesia in 1966, the core economic education has been based on neo-classic and Keynesian variants. Research in economic theories has not developed after World War I. The heat of theoretical debate on "economic dualism" in the Netherlands in 1930s in which two notable Indonesian economists had made some contributions has cooled off completely. There is a danger that younger Indonesian economists, especially those who do not have access to foreign publications will consider the neo-classical economics as the only economics. The paper on comparative Economic Systems which is normally offered as a supplementary course to economic theory (available only in stronger economic faculties), should generate awareness among students of some other alternative theoretical bodies of analysis of economic phenomena.

The policy to produce generalists with limited specialization has been responsible for the lack of good quality professional economists. The students are just introduced to different concepts but not adequately trained to search solution of economic problems. More exercises and laboratory work on empirical data need to be promoted. Students tend to learn many subjects superficially without deeper insight into the real problems. Package curriculum is also a weak point in education. With almost no chance available for the students to learn subjects outside the package has resulted in their considerable ignorance of non-economic issues and social problems. This in turn has made them ill-equipped to deal with policy matters whose ramifications go beyond the realm of economics. Economics graduate have to undergo some in-service training before they are capable of doing independent work. Successful career of young economists in academic field depends on intensive guidance of their seniors.

Professionalization is emphasized more in the business sector, including in government banks. Arrangements have been made with the University of Indonesia and the Gadjah Mada University to conduct special training courses in banking management for new recruits of a State Commercial Bank. This kind of training covers topics of more technical nature such as cost-benefit analysis, project evaluation techniques, credit worthiness tests, etc. For government planning officials, there is National Planning Programme at the University of Indonesia with a similar technical focus. In the eyes of the government bureaucracy, however, the distinction between economics, agricultural economics, and business administration is very vague. Graduates of the three departments generally get almost similar assignments in executive job.

Serious question has been raised on the value of economics graduates to deal with traditional sector of the economy and also in co-operative organizations. There is a general impression that economics education is relevant to the modern sectors of the economy. While ideologically co-operative organization is supposed to be a bulwark of the Indonesian economic system, formal training in this area receives only marginal attention.

The professional economists are located in few universities. Their number is small and the demands on their time are extensive. In addition to teaching they are very frequently invited to sit in various governmental committees. Consultancy work for economists in Indonesia is, so far, confined to government sectors. Private business consultancy usually goes to consulting private firms handled by a handful of top economists in co-operation with foreign consultants. Only very few faculty members join this activity. There is only one non-university research institute which deals with economic problems i.e. the National Economic and Social Institute (LEKNAS), a branch of the government Institute of Sciences (LIPI). LEKNAS has only one senior economist assisted by several junior colleagues.

In the private sector, several organizations are active in economic research. The most notable one is the LP3ES (the Institute of Economics and Social Reasearch, Education, and Information). It publishes the renowned monthly social science magazine *Prisma* and good quality textbooks in economics and other fields. It is also active in surveys and researches on economic problems, especially in the rural areas and in small scale industries. The others are *Lembaga Studi Pembangunan* (the Institute of Development Studies) and *Pusat Pengembangan Agro-Bisnis* (Agro-Business Development Centre). Their activities are partially funded by the government contracts in addition to some external contributions.

Extensive time demands have compelled a few good professional economists to move away from narrow specialization into diverse sub-fields and specialties within the discipline of economics. As a consequence, research has suffered, and the Universities have not been able to develop needed infra-structures of research. Extra-institutional work has affected attachment and loyalty to the University; outside attractions have thus been responsible for growing alienation among the faculty.

In addition to agricultural economics, professionalism has also developed in regional economic analysis. A core of young able economists interested in this particular field have been very active in seminars, and they have also published a good deal.

The teaching of public economics (meant as an analysis of public production and consumption and their relations to the private sector), which was initiated at the University of Indonesia in 1960s as a response to the political swing towards the more dominant role of the government sector of the economy, was discontinued in the seventies. This was hand in hand with the counter-swing of economic policy after 1966, in which a substantial role in economic life was envisaged for the private sector.

Despite very limited government funding for international travels, Indonesian economists of good standing frequent international seminars under the aegis of international agencies. With the domestic restriction on Marxian economics since 1966, professional communications with economists from the eastern world has stopped completely. This is likely to distort the outlook of young economists who are exposed only to a one-sided view, and the perspective of capitalist economy.

For some Indonesian academic economists, 1980 and 1981 were particularly active years when they engaged themselves in evolving a national economic system based on the political philosophy of *Panca Sila*. The upsurge of economic essays on the subject appeared in social science magazines and even in daily newspapers. Seminars and symposia were conducted on the campuses as well as at the national level. The discussion mostly drove around the idea of finding a national economic system which is neither capitalistic nor socialistic in its main features. The outcome of this exercise was, however, very sterile. After delineating all idealistic norms like equity, co-operation, social justice, etc., it stopped where it was supposed to start. Central economic problems related to the laws of production, distribution, and consumption were touched perfunctorily and dismissed without detailed diagnosis and prescriptions to their solution. Questions on institutional arrangements such as ownership of production assets, motivations of private and public economic behaviour which in the last instance will determine prices and efficiency were dealt with more on the basis of ideology than on rigorous economic analysis. Ultimately, the discussion moved into the political arena and many economists bowed out of the scene.

In spite of the many short-comings in the quality of empirical research due to lack of funds and also pressure of time to complete commissioned research, there is some unfailing sign of notable progress in the number of researches done every year. There are more research papers submitted in the bi-annual economic conferences in recent years than five year ago.

The Indonesian Economic Association (ISEI) is an umbrella professional organization covering university graduates from economic faculties (domestic as well as foreign) including agricultural economics, business administration and accounting. Alongside this umbrella organization there are Indonesian Accounting Association (IAI), and Indonesian Agricultural Economics Association

(PERHEPI). The latter organization is not an exclusively professional body as it also admits lay enthusiasts as members.

Better communication among ASEAN economists in recent years has become possible with the founding of the ASEAN Economics Association, which organizes regional seminars and conferences.

Two major professional publications are available: The *Ekonomi dan Keuangan Indonesia* (Indonesian Economics and Finance), a bilingual journal published by the Indonesian Economic Association; and the *Agro-Ekonomika* (in Indonesian), published by the Agricultural Economics Association. The Australian Nation University (ANU) in Canberra publishes an English journal devoted to the Indonesian economic problems called Bulletin of Indonesian Economic Studies (BIES). All the three publications are major forums of communication for Indonesians as well as foreign scholars. The varying quality of publications stems from the lack of serious peer reviews on the scholarly work; overcommitted few economists with over-diversified interests are unable to participate in regular scientific dialogues.

The recurrent graduation of young economists has apparently not replaced the partial commitments of their seniors. The two are still non-competing groups in professional life. There will be some time until many more well-trained economists are available to relieve some of the burden of the seniors. Finally, although the government has, in general, been sympathetic toward the intelectual community and has been encouraging research yet there remains much to be desired.

V. Agenda for the Future

Economics as an independent social science discipline in Indonesia is still young. It started after the World War II with the founding of the economic faculty at Ujungpandang in 1948, and subsequently was integrated with the University of Indonesia in 1950. It experienced some discontinuity in 1960s due to political changes. The surge of new development took place after 1966 with some limitation of different kind. With the ban on Marxian writings, economics teaching and research in Indonesia are solely based on neo-classical theories.

The core of well-trained economists consists of returnees from foreign graduate studies especially from the United States. Until early 1970s they were clustered in two major economic faculties, i.e. at the University of Indonesia in Jakarta and Gadjah Mada in Yogyakarta. Due to external assistance especially the

Ford Foundation, the USAID, and the Rockefeller Foundation, more returnees have begun joining regional universities.

In those places, however, their number is usually too small.

Since the number of fellowship will always be very limited in the future, the critical strategic step should be the enhancement of national capability to produce home-grown well-trained economists with better quality. If the number of annual graduates produced so far may be considered sufficient, the critical point would be of increasing the quality of their training and competence. This is not an easy task. With excessive time demands on senior economists from the government as well as from the private sector, and also the low salary level of civil servants, that includes teaching faculty, it has been very difficult to motivate them to spend more time in the department, and to engage in serious research. Financial incentive structure needs to be changed to achieve some acceptable time commitment from senior staff. Substantial improvement of academic environment like working space, library provisions, etc. will also be needed.

Economics education has to be more integrated with other branches of social sciences like sociology, anthropology, and political science. This integration, however, should not sacrifice good grounding in economic theory and sound training in quantitative analysis.

Contract research will play a better role both in seeking answers to policy issues as well as in generating professionalism in economics if better thematic and specialized training is offered. One-shot quick surveys on many unrelated topics disperse interests and commitment very thinly and are of benefit to no one.

The concept of a package curriculum will have to give way to more elective courses so that students are prepared with a solid basis for better specialization. The policy of producing "generalists with limited specialization" apparently does not now meet the needs of the day, and certainly is ill-suited for meeting the demands of the future.

Contract researches encouraged by the government in the past few years have improved some degree of relevance of economics education, bringing into focus concrete economic and developmental problems of the country, and giving rigorous drill in the application of theories to real economic problems. On the other hand, too much emphasis on contract research has hampered genuine academic development. Research reports of this kind are never put in the general library, so that they do not encourage discussion among scientists, and facilitate peer-review. Since contracting agencies are usually manned by non-professionals, requirements on quality are relatively light. Some tolerance on scientific discussion on less sensitive research reports by the government will in effect be beneficial to all parties involved. While peer-review would ensure quality control, the government will also get better deal for its investment on research. Within the Indonesian political culture this has to be nurtured on the basis of mutual trust between the government and the scientists, which in turn will help develop sound academic climate. Making available commissioned research reports to the public will also enrich teaching as these would provide relevant illustrative content. Some larger fundings should be made available for theoretical research. For better scientific disseminations the existing national centre for scientific documentation can play a more active role. It probably has to be supported with a legal institution like mandatory deposit for all publications in the country.

Textbook writings with concessional income tax rebate or even subsidy will improve teaching quality substantially. At the moment, the post-*sarjana* educations of S_2 and S_3 lay the ground work for future Indonesian economics professionals. Their success by and large depends on the time commitments of relatively few well-trained economists. Although money does not buy everything, better financial incentive probably is a necessary condition.

As the world of sciences becomes more and more internationalized, proficiency in foreign languages, especially English, has in fact become a necessity. Post-*sarjana* education, therefore, should include intensive English training in its curriculum.

Senior Indonesian economists have gained honour and respect in the society. They are the ones who designed and implemented policies to salvage the economy from virtual bankruptcy in the sixties, and to ensure a continuous high rate of growth for fifteen years. Their tenures in the government for about two decades left a big gap in the academic institutions, especially at the University of Indonesia. Vigorous man-power development so far has not completely filled the gap, as new returnees from foreign graduate studies are also absorbed into the government. When will it reach a saturation point, is everybody's guess. The only possible solution is to produce more good economists in the country. Those who still have faith in education and are willing to devote fully to teaching and research should be encouraged.

If in the past the major burden of economics education in Indonesia were borne by external donor agencies, the government should, in the future, be willing to make considerable investment in this endeavour to ensure indigenous development of the discipline.

FOOTNOTES

1. See Malcolm Gillis, "Economics in Indonesia and The Ford Foundation," *The Ford Foundation Economics Review*, November 30, 1975, Mimeographed pp. 13-14.
2. Gillis, Ibid.
3. Interview with Dr. Djunaedi Adisumarto, Dean, Faculty of Economics, University of Indonesia, Jakarta, November 25, 1982.
4. See Heinz W. Arndt, "Empirical Economic Research in Indonesia," *Ekonomi dan Keuangan Indonesia*, (Indonesian Economics and Finance) Volume XXVI No. 3, September 1978.
5. Arndt, Ibid.
6. See Edgardo Boeninger, "Application of the Social Sciences in Public Policies: Producers, Consumers, and Mechanisms of Mediation," in Laurence D. Stifel et al. eds., *Social Sciences & Public Policy in the Developing World*. Lexington Books, 1982, p. 252.
7. Arndt, op. cit.

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Gillis, Malcolm	1975	"Economics in Indonesia and the Ford Foundation," *The Ford Foundation Economics Review*, November 30, Mimeographed.
Gillis, Malcolm	1975	*The Economics Faculty at Gadjah Mada University: An Assessment of Past Development and Future Prospects*, Report to the Ford Foundation, Jakarta Field Office, February 28, Mimeographed.
Klitgaard Robert E.	1982	"Some Issues in Academic Economics in Indonesia." A note written after a brief consulting visit to the Universities of Indonesia and Gadjah Mada, January, under the auspices of the International Communication Agency and the Agency for International Development, Mimeographed.
Stifel, Laurence D. et al. eds.	1982	*Social Sciences and Public Policy in the Developing World*, Lexington Books.

TABLE 1

List of Faculties of Economics
State University

No.	Faculty of Economics State University	Dean	Established in	Statutory Act	Department	Established in
1.	SYIAH KUALA - Aceh	Drs. Tabrani	2-11-1959	P. dan K No. 3328/S.	1. Economics 2. Management 3. Accounting	2-11-1961 2-11-1961 14- 1-1970
2.	NORTH SUMATRA -Medan	O.K. Harmaini, S.E.	24-11-1961	PTIP No. 64/1961	1. Economics 2. Management 3. Accounting	- - -
3.	RIAU - Pakanbaru	Drs. Syaid Syahbuddin	1-10-1962	PTIP No. 107/1963 20 Sept 1963	1. Economics 2. Business Adm. 3. Accounting	1963 1963 1963
4.	ANDALAS - Padang	Drs. Syahrud din, M.A.	1957	-	1. Economics 2. Business Adm. 3. Accounting	1961 1961 1978
5.	SRIWIJAYA - Palembang	Drs. Soebedjo	1953	PT No.: 42/1960	1. Business Adm. 2. Economics 3. Accounting	1960 1962 1964
6.	JAMBI - Jambi	Drs. Ramlie	1963	-	1. Economics 2. Business Adm.	- -

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TABLE 1

No.	Faculty of Economics State University	Dean	Established in	Statutory Act	Department	Established in
7.	LAMPUNG - Telukbetung	Ahmad Ismail, S.E.	1963		1. Economics 2. Business Adm.	- 1962 - 1962
8.	INDONESIA - Jakarta	Dr. Djunaedi Hadisumarto	12-11-1950	No.:3604/BPT	1. Economics 2. Management 3. Accounting	- - -
9.	PADJADJARAN - Bandung	Drs. Hassan Poeradimadja	1957	-	1. Economics 2. Business Adm. 3. Accounting	1957 1957 1968
10.	SUDIRMAN - Purwokerto	Drs. H.M. Musa	October 1963	-	1. Economics 2. Business 3. Agric. Economics 4. Public Economics	- - - -
11.	GADJAH MADA - Yogyakarta	Dr. Sukanto Reksohadiprodjo	19-9-1955	No.:53759/Kab	1. Economics 2. Agric. Economics 3. Business Adm. 4. Accounting	1956 1956 1956 1963/1964
12.	DIPONEGORO - Semarang	Drs. B. Soenardi	14-3-1960	PP.7 Tahun 1961 Tg.1 21-3-1961	1. Economics 2. Business Adm.	11-3-1960 11-3-1960
13.	SEBELAS MARET - Surakarta	Drs. Suhardi	11-3-1976	Keppres R.I. No.10/1976	1. Economics 2. Business Adm. 3. Accounting	October 1976 11-3-1976 -

TABLE 1

No.	Faculty of Economics State University	Dean	Established in	Statutory Act	Department	Established in
14.	BRAWIJAYA - Malang	Drs. O.S. Hastoeti Harsono	1963	Kepprew R.I. No.196/1963 Tgl.23-9-1963	1. Economics 2. Management	- 1963 - 1963
15.	AIRLANGGA - Surabaya	Prof. Drs. Ec. Miendrowo Prawirodjoemono	8-8-1961	PTIP No.31/1961	1. Economics 2. Business Adm. 3. Accounting	1962/1963 - -
16.	JEMBER - Jember	Drs. Suhanto	10-11-1964	PTIP no.151/ Tahun 1964	1. Economics 2. Business Adm.	1968 1964
17.	UDAYANA - Bali	Drs. Ketut Purwa	1967	-	1. Economics 2. Business Adm.	- -
18.	TANJUNGPURA - Pontianak	Drs. Syamsudin Djahmat	1959	PTIP No.53/ 1961	1. Economics 2. Management	- -
19.	LAMBUNG MANGKURAT Samarinda	Drs. Masrani Basri	1958	-	1. Economics 2. Business Adm. Management	 1972 1958
20.	PLANGKARAYA - Palangka Raya	Drs. B.S. Tundan	1963	-	1. Economics 2. Business Adm.	- -
21.	MULAWARMAN - Samarinda	Drs. Daniel Sambo	4-5-1966	No.12/1966	1. Economics 2. Management	1966 1966

TABLE 1

No.	Faculty of Economics State University	Dean	Established in	Statutory Act	Departments	Established in
22.	HASANUDDIN - Ujung Pandang	Dr. Ny. Kustiah Kristanto	1948	-	1. Economics 2. Business Adm.	- -
23.	SAM RATULANGI - Manado	Drs. F.A.S. Palar	17-9-1961	-	1. Economics 2. Management 3. Akuntansi	1961 1961 1979
24.	PATTIMURA - Ambon	Drs. R. Manikallo	1-9-1965	PTIP No.180/1965	1. Economics 2. Management	20-7-1979
25.	MATARAM - Mataram	Drs. Hasbullah	19-12-1963	-	1. Economics 2. Business Adm.	- -
26.	TADULAKO - Palu	Amir Bachri Ali, S.E.	8-5-1966	Keppres R.I. No.36/1981	1. Economics 2. Management	1982 1982
27.	AGRICULTURAL UNIVERSITY Bogor (IPB)	I. Gusti Bagus Teken	1946	-	1. Agric. Economics	- -
28.	BANDUNG INSTITUTE of TECHNOLOGI (ITB)	Ir. Muhammad Faisal, MSIE	1-1-1971	Rektor ITB No.04/SK/REK/ITB/71	1. Industrial Economics 2. Management 3. Operation System 4. Operation Research	- - - -

TABLE 2

Composition of Faculty Staff

No.	Faculty of Economics State University	Professor	Senior Lecturer	Lecturer	Instructor	Total
1.	Syiah Kuala	1	6	42	38	87
2.	North Sumatra	2	10	47	47	106
3.	Riau	-	3	9	29	41
4.	Andalas	-	9	35	24	68
5.	Sriwijaya	-	2	42	27	71
6.	Jambi	-	2	6	14	22
7.	Lampung	-	2	13	17	32
8.	Indonesia	10	36	53	71	170
9.	Padjadjaran	1	9	61	45	116
10.	Sudirman	1	4	30	19	53
11.	Gadjah Mada	4	15	15	45	79
12.	Diponegoro	-	6	18	20	44
13.	Sebelas Maret	-	1	9	30	40
14.	Brawijaya	-	3	24	35	62
15.	Airlangga	1	5	33	35	74
16.	Jember	-	-	33	7	40
17.	Udayana	-	3	9	42	54
18.	Tanjung Pura	-	1	6	17	24
19.	Lambung Mangkurat	-	4	16	10	30
20.	Palangka Raya	-	-	4	11	15
21.	Mulawarman	-	-	12	17	29
22.	Hasanuddin	2	12	12	45	71
23.	Sam Ratulangi	1	7	32	5	45
24.	Pattimura	-	-	2	23	25
25.	Mataram	-	5	13	8	26
26.	Tadulako	-	2	1	13	16
27.	IPB	4	12	20	4	40
28.	ITB	1	2	4	32	39
	Total	27	161	601	730	1519

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TABLE 3

Education of Faculty Staff

No.	Faculty of Economics State University	Sarjana	Sarjana+ domestic Post Sarjana	Sarjana+ Master	Master	PhD. or Doctor
1.	Syiah Kuala	79	-	4	-	4
2.	North Sumatra	99	-	4	1	2
3.	Riau	40	-	1	-	-
4.	Andalas	60	-	6	-	-
5.	Sriwijaya	57	11	2	-	1
6.	Jambi	22	-	-	-	-
7.	Lampung	30	-	2	-	-
8.	Indonesia	90	-	46	3	31
9.	Padjadjaran	104	-	9	1	2
10.	Sudirman	53	-	-	-	-
11.	Gadjah Mada	45	-	15	1	18
12.	Diponegoro	42	1	1	-	-
13.	Sebelas Maret	40	-	-	-	
14.	Brawijaya	56	2	3	-	1
15.	Airlangga	72	-	2	-	-
16.	Jember	39	-	1	-	-
17.	Udayana	52	-	1	1	-
18.	Tanjung Pura	23	-	1	-	-
19.	Lambung Mangkurat	29	-	1	-	-
20.	Palangka Raya	14	1	-	-	-
21.	Mulawarman	25	3	1	-	-
22.	Hasanuddin	44	9	13	-	5
23.	Sam Ratulangi	44	-	-	-	1
24.	Pattimura	25	1	1	1	1
25.	Mataram	22	-	2	2	-
26.	Tadulako	14	2	-	-	-
27.	IPB	22	2	6	1	8
28.	ITB	14	2	2	-	1
	Total	1256	34	124	11	75

TABLE 4

Student Body

No.	Faculty of Economics State University	Male	Feamale	Under Grad.	Sarja-na	S_2	S_3	Total
1.	Syiah Kuala	512	106	532	86	4	4	618
2.	North Sumatra	1393	423	1052	764	5	-	1816
3.	Riau	674	249	741	182	1	-	923
4.	Andalas	821	350	805	366	-	-	1171
5.	Sriwijaya	391	324	354	361	2	3	715
6.	Jambi	558	106	494	150	-	-	644
7.	Lampung	376	127	368	130	4	4	506
8.	Indonesia	998	578	1447	129	-	-	1576
9.	Padjadjaran	1554	576	1149	971	8	5	2133
10.	Sudirman	777	229	610	396	2	3	1011
11.	Gadjah Mada	1004	400	818	586	24	26	1454
12.	Diponegoro	688	366	844	210	3	4	1061
13.	Sebelas Maret	830	439	884	385	4	1	1274
14.	Brawijaya	994	462	967	489	8	7	1471
15.	Airlangga	751	425	857	319	11	8	1195
16.	Jember	1151	422	1241	332	8	1	1582
17.	Udayana	1254	434	1227	461	7	4	1699
18.	Tanjung Pura	528	207	404	331	5	-	740
19.	Lambung Mangkurat	790	308	828	270	2	1	1101
20.	Palangka Raya	415	140	502	53	-	-	555
21.	Mulawarman	1041	181	1181	41	2	1	1225
22.	Hasanuddin	1293	357	353	1297	11	13	1674
23.	Sam Ratulangi	907	536	1173	270	4	-	1447
24.	Pattimura	423	146	380	189	5	-	574
25.	Mataram	686	194	696	184	-	-	880
26.	Tadulako	520	115	575	60	1	-	636
27.	IPB	162	100	199	63	46	21	329
28.	ITB	458	63	371	150	50	-	571
	Total	21949 (72.4%)	8363 (27.6%)	21052	9225	217	106	30601

Note: Those registered at S_2 and S_3 programmes are junior staffs or TA; on study leave at UGM, UI, IPB or ITB.

TABLE 5

Student Body by Department

No.	Faculty of Economics State University	Preparatory	Economics	Bus. Ad.	Account	Agri. Econ.
1.	Syiah Kuala	256	68	166	128	-
2.	North Sumatra	449	136	484	747	-
3.	Riau	310	227	319	67	-
4.	Andalas	354	236	370	211	-
5.	Sriwijaya	223	71	270	151	-
6.	Jambi	348	148	148	-	-
7.	Lampung	294	62	147	-	-
8.	Indonesia	589	98	271	618	-
9.	Padjadjaran	774	201	596	549	-
10.	Sudirman	-	120	839	-	47
11.	Gadjah Mada	347	121	449	433	54
12.	Diponegoro	573	40	441	-	-
13.	Sebelas Maret	524	265	480	-	-
14.	Brawijaya	206	134	777	339	-
15.	Airlangga	561	101	207	307	-
16.	Jember	222	600	751	-	-
17.	Udayana	-	538	1150	-	-
18.	Tanjungupura	131	348	256	-	-
19.	Lambung Mangkurat	-	183	915	-	-
20.	Palangkaraya	218	100	237	-	-
21.	Mulawarman	563	32	627	-	-
22.	Hasanuddin	353	541	446	290	-
23.	Sam Ratulangi	318	497	597	31	-
24.	Pattimura	127	243	199	-	-
25.	Matram	546	154	180	-	-
26.	Tadulako	575	43	17	-	-
27.	Agric, University (IPB)	-	-		-	262
	Total	8861	5269	11359	3871	363

SIX

MALAYSIA: *Paul Chan*

I. Introduction for Teaching and Research

Universities in Malaysia provide teaching and research services. Teaching serves to meet the need for highly-qualified manpower, while research contributes to the development and advancement of knowledge. The academics are the 'production workers' of the universities; the teaching and research they do determine, to a considerable extent, the success of universities in fulfilling their obligations to the society at large.

1. Faculty Organization and Administration

In Malaysia, higher education is provided by five universities. Among these, only Universiti Malaya (UM), Universiti Kebangsaan Malaysia (UKM), and Universiti Sains Malaysia, (USM) offer major academic programmes in economics. All the universities have an identical administrative system. Thus each faculty/school is administered by the dean, who is assisted by his deputy (or deputies), with the division/department programme headed by a chairman. Each administrator has his own specific duties and responsibilities. However, organizational structures vary from University to university. It may be multi-divisional or multi-departmental Faculty, or a multi-programme School, depending on its appropriateness to the development of the fields of study, and the needs and resources of each university.

The Faculty of Economics and Administration of University of Malaya was the first to be established in Malaysia. It is subdivided into seven divisions: Analytical Economics, Applied Economics, Rural Development, Accounting, Business Administration, Public Administration, and Statistics. There are four reasons for the preference of a divisional structure rather than a departmental one. First, divisional structure has greater flexibility and could easily be changed if situation demands. Secondly, such a structure involves lower operational costs since it does not require a fixed establishment of academic, secretarial, and clerical staff. Thirdly, there can be greater mobility of academic staff between divisions, thus eliminating waste and improving efficiency in teaching. Fourthly, it facilitates co-ordination of the various areas of economics, since they are closely related to one another.

Universiti Kebangsaan Malaysia has only four departments in its Faculty of Economics (1979); namely, Department of Economic Analysis and Public Policy, Economic Development and Planning, Agricultural and Resource Economics, and Economic Statistics.

Unlike the other two universities, Universiti Sains Malaysia has opted for a multi-programme School system; here the Economics and Development Studies Programmes are located in the School of Social Sciences (1970). The School system was adhered to mainly because it was regarded as more appropriate for the provision of interdisciplinary education.

Since some of the above divisions/departments/programmes offer rather similar courses, they are categorised into seven areas of economics as follows:

(i) Analytical Economics, Economic Analysis and Public Policy, and Economics;

(ii) Applied Economics, Economic Development and Planning, and Development Studies;

(iii) Rural Development, and Agricultural and Resource Economics;

(iv) Accounting;

(v) Business Administration;

(vi) Public Administration; and

(vii) Statistics and Economic Statistics.

2. Staff Profile: The Academic Hierarchy

As in all Malaysian universities, the hierarchy of academic positions in the economics discipline consists of four main career grades or levels of seniority, each with corresponding salary scales.

These grades are:

(i) professors,

(ii) associate professors,

(iii) lecturers, and

(iv) tutors.

Academic staff who are Malaysian citizens are appointed initially on a probationary period of 18 months (for serving employees) or three years (for candidates through direct appointment), with prospects of tenure to the retiring age of 55. These sevices may be extended to the age of 60. Non-Malaysian staff are appointed on a contract of three years subject to the possibility of further contracts or on visiting arrangements.

Table 1 shows the total number of academic economists in each university, classified by grade. Two significant characteristics can be noted. First, Universiti Malaya has the largest concentration of academic economists; second, lecturers constitute the largest group among the four grades, and the number of the professors is the smallest. In fact, there is no professor in Universiti Kebangsaan Malaysia, and there is only one professor and one associate professor in Universiti Sains Malaysia. It is thus evident that the country does not have many senior economists in the University system; most of the teaching is carried out by the young lecturers.

TABLE 1

Total Number of Professional Economists by Grade, 1981/82

	Professors	Associate Professors	Lecturers	Tutors/ Fellows	Total
Universiti Malaya (UM)	4	17	57	15	93
University Kabangsaan Malaysia (UKM)	-	8	46	3	57
Universiti Sains Malaysia (USM)	1	1	16	4[a]	22

[a] These are Fellows on the Academic Staff Training Scheme.

3. The Academic Profile

Due to the minimum required qualifications and relevant experience for entering each grade, the level of training is related to the individual's post (see Table 2). The senior staff (professors and associate professors) have a Ph.D. or professional qualifications in their field, whereas the majority of lecturers have only a Master's degree. However, it should be noted that three tutors of the University of Malaysia have already earned their Master's degree, but are not yet appointed as lecturers. This is somewhat surprising because first, the minimum qualification for appointment as a lecturer is a master's degree; secondly, none of the economists with a master's degree serve as tutors in University Kebangsaan Malaysia (UKM) and Universiti Sains Malaysia (USM). It is also interesting to add that except for UKM, all associate professors in the other two Universities have a Ph.D.

After joining the university profession, some individuals pursue a higher degree either locally or overseas. Indeed, it can be seen from Table 2 that three associate professors and a substantial number (23) of lecturers are doing their Ph.D. Furthermore, more than half of the tutors are studying for their master's degrees. These tutors are all in overseas universities and they are financed and supported by their respective universities. A glance at Table 2 would suggest that of the 39 economists pursuing further studies, only one from each of the divisions of Accounting, and of Business Administration is doing it, with the majority from Applied Economics/Economic Development and Planning/ Development Studies.

TABLE 2

Level of Training of Professional Economists by Grade, 1981/82

(figures in parentheses show the number of those pursuing higher degrees).

	Professors	Associate Professors	Lecturers	Tutors/ Fellows	Total
Doctorate	4	20	15	-	39
Master's degree	1	3 (3)	81 (23)	3 (1)	88 (27)
First degree	-	-	-	6 (12)	6 (12)
Total	5	26	119	22	172

Academic economists in the universities are assigned to specific divisions/departments/programmes, as shown in Table 3. However, they may be required to teach courses in other areas. This encourages feedback between fields of specialzation since the various areas of economics are intimately related with one another.

TABLE 3

Fields of Specialization of Professional Economists, 1981/82

Fields of specialization	Numbers of Economists in Each Field
1. Analytical Economics/Economic Analysis and Public Policy/Economics	37
2. Applied Economics/Economic Development and Planning/Development Studies	40
3. Rural Development/Agricultural and Resource Economics	23
4. Accounting	11
5. Business Administration	10
6. Public Administration	17
7. Statistics/Economic Statistics	25
8. Not Known	9
Total	172

4. Major Monetary Resources

Salaries for the academic staff are the same in all the universities. The salary scales are given below:

TABLE 4
Salary Scales for Different Categories of Teachers

Career Grade	Salary Grade	Salary Scale in Malaysian Ringgit (roughly US$1 = M$2)
Professor	A 7	$3,460 x 150 - 3,610/Review Point
	A 6	$3,760 x 150 - 3,910
Associate Professor	A 9	$2,920 x 120 - 3,040/Review Point
	A 8	$3,190 x 120 - 3,310
Lecturer	A14	$1,420 x 60 - 1,540/1,600 x 60 - 1,720/1,840 x 100 - 2,340/Review Point
	A10	$2,650 x 120 - 2,770
Tutor	A26	$1,000 x 60 - 1,600

The salary scales are categorized by the four main career grades (or schemes of service) of professor, associate professor, lecturer, and tutor. Each grade has two salary scales, except for tutors who have only one scale. Each salary scale in turn consists of an incremental scale with minimum and maximum points.

The starting salary or the point on the salary scale at which an individual is first emplaced is decided by the university concerned based on an assessment of his/her experience and qualifications. Moreover, movement from the maximum point of a lower scale to the minimum point of the next higher scale (within the same grade) is not automatic but subject to a review point of two years.

In addition to their basic salary, academics enjoy various types of monthly allowances. First, they are paid housing subsidies, entertainment allowances, and civil service allowances, the amount of which depends on the career and salary grades they are in. The structure of allowances is as follows:

TABLE 5

Allowances Paid In addition to Salary to the Academic Staff

Career Grade	Salary Grade	Housing Subsidy	Entertainment Allowance (per month)	Civil Service Allowance
Professor	A 7	M$ 750	M$ 800	
	A 6	$1,000	$1,000	-
Associate Professor	A 9	$ 450	$ 550	-
	A 8	$ 600	$ 600	-
Lecturer	A14	-	-	M$125
	A10	$ 350	$ 500	-
Tutor	A26	-	-	$125

Administrative duties allowances are paid to those who hold administrative posts, such as deans, deputy deans, or heads of departments. These payments are as follows:

TABLE 6

Allowances for Administrative Duties

Administrative Post	Allowance per month
Dean	M$250
Deputy Dean	$200
Heads of Department	$150

Superannuation or retirement benefits are available in the form of Employees' Provident Fund (E.P.F.), pension, and gratuity. During the first ten years of service, the university contributes 10 per cent of academics' monthly basic salary to the E.P.F. (while the staff member contributes 6 per cent). Thereafter they are eligible for pensionable status, and on retirement for pension and gratuity.

Opportunities for supplementary earnings from outside consultation and other work are available, within certain limits, for non-medical staff. However, they are allowed to retain all fees from such work only up to a maximum of M$3,000 a year; the remainder is required to be given to the university.

5. Student Profile

Student Enrolment in Economics at Undergraduate and Graduate Level:

Table 7 shows that a total of 2,718 students were enrolled at the undergraduate level in economics at the three universities in 1979/80. It also indicates that Universiti Malaya has the largest student enrolment. Besides, it also has postgraduate students studying for Diploma in Accounting, Business Administration and Public Administration, as well as master of Economics and Public Administration (both by dissertation or coursework and dissertation) and Ph.D.

TABLE 7

Student Enrolment in Economics at Undergraduate and Graduate Level 1979/80

	Undergraduate	Graduate	Total
Universiti Malaya	1,265	113	1378
Universiti Kebangsaan Malaysia	438	-	438
Universiti Sains Malaysia	1,015	-	1,015
Total	2,718	113	2,831

II. Curricula at Undergraduate and Graduate Level

In view of the increasing need for qualified manpower, the basic goal of the curricula in economics is to equip students with a basic foundation for understanding and analysing problems from a perspective which embraces economics and related areas of study. Furthermore, it also aims to develop in each student some measure of specialization with a concern for the employment needs of the country. Although the emphasis rests on the concept of a graduate who is conversant with a broad range of knowledge pertinent to economic and related issues, the universities are aware of the necessity to provide some training in quantitative techniques.

This section examines the components of the curricular in each area of economics in the three universities.

In the area of Analytical Economics/Economic Analysis and Public Policy/Economics, the groundwork is provided for moulding economists by offering courses that develop a thorough understanding of economic principles and theory from elementary to advanced levels, both micro and macro. (Note that in the case of UM Macroeconomics is taught by the Applied Economics Division.) Students also have an opportunity for opting specialized fields, which cover a wide range, including such fields as monetary economics, public finance, international economics, welfare economics, and economic thought.

The course structure of Applied Economics/Economic Development, and Planning/Development Studies is mainly oriented towards the theory and problems of economic development and planning as well as their application to the experience of Malaysia and other countries. Special attention is also given to the application of economic analysis to the fields of education, labour, transportation, regional economic co-operation, income distribution, and health. In Universiti Sains Malaysia, students are also exposed to courses on methods and techniques for analyzing basic development problems, health and nutrition, technology and environment, and Islamic development.

Universiti Malaya and Universiti Kebangsaan Malaysia also offer courses focussing on the principles of rural and agricultural development and their context in the Malaysian situation. Universiti Kebangsaan Malaysia also has programmes in resource economics. However, these fields of study are not reflected in the Universiti Sains Malaysia curricula.

The Faculty of Economics and Administration, Universiti Malaya, as its name suggests, also prepares students for careers in administration. The Division of Business Administration provides them with training in management and the functional areas of business such as production, marketing, finance, and industrial relations. In the Public Administration Division, the courses include theory and practice of public administration and related subjects at local, state and national levels. The programme offered by the Division of Accounting is aimed at producing accountants with a professional background and at the same time trained in the basic tools of economic analysis.

The undergraduate curricula also encompass quantitative concepts and techniques and their application through courses such as econometrics, mathematical statistics and sampling methods. Students can also learn computer programming.

The curricula for economics at the graduate level involve an extension of undergraduate courses in micro- and macro-economics, quantitative analysis, economic development and planning, and the economy of Malaysia and Southeast Asia. In addition, students are introduced to research methodology so as to acquire some knowledge in conducting research scientifically. The programmes for Master of Economics are serviced primarily by the Divisions of Analytical and Applied Economics, Rural Development and Statistics.

The course offerings in different subspecialties in economics at the three universities are given in the following table.

TABLE 8

Curricula at Undergraduate Level Categorized According to Topic

	Universiti Malaya	Universiti Kebangsaan Malaysia	Universiti Sains Malaysia
Accounting	Accounting Management Accounting Accounting Theory and Practices Corporate Finance, Policies and Practices Commercial and Company Law Auditing Taxation Computer and Programming		
Analytical Economics/ Economic Analysis and Public Policy/Economics	Microeconomics Public Finance International Economics Monetary Economics Welfare Economics Mathematical Economics Theory of Public Investment International Finance Economics of Income and Wealth Distribution Primary Commodity Control	Microeconomics Macroeconomics Monetary Economics International Economics Public Finance Economic Systems Industrial Economics Labour Economics Growth Economics Development of Economic Thought Mathematical Economics Public Enterprise and Utility	Agricultural Economics Monetary Economics Microeconomics Economic Development Third World Political Economics Macroeconomics Industrial Relations Quantitative Economics International Economic Development Labour Economics Public Finance International Economics Econometrics

	Universiti Malaya	Universiti Kebangsaan Malaysia	Universiti Sains Malaysia
Rural Development/ Agricultural and Resource Economics	Malaysian Economics Social Systems Agricultural Economics Economics of Agricultural Production Agricultural Marketing Economics of Natural Resources Sociology of Development of Developing Countries Co-operation	Economics of Agricultural Production Resource Economics Agricultural Policy Agricultural Marketing Co-operatives Mineral Economics Environmental Economics Economics of Agricultural Development Economics of Agricultural Management Agricultural Finance Agricultural Commodity Price Analysis	
Business Administration	Business Administration Production Management Industrial Relations Marketing Management Financial Management Business Policies and Practices Management Science Marketing Policies and Practices Financial Policies and Practices		

	Universiti Malaya	Universiti Kebangsaan Malaysia	Universiti Sains Malaysia
Statistics	Quantative Analysis Mathematical Statistics Social and Economic Statistics Econometrics (Including Fotran Programming) Experimental Design and Sampling Techniques Demography	Mathematical Analysis Mathematical Statistics Economic Statistics Analysis Econometrics Computer Programming Sampling Methods Economic Demography Operations Research Survey Methods in Investigation	
Applied Economics/ Economic Development and Planning/Development Studies	Macroeconomics Economic Development Planning Economic Development of Southeast Asia Labour Economics Economics of Education Industrial Economics Economic History	Economic Planning Economic Development Theory Issues and Policies in Development Consumer Economics Development Administration Economic Planning and Development in Malaysia Transport Economics Urban Economics Case Studies in Planning and Development International Economic Development Economic History	Development Theory Social Structure and Development Development Studies Practicum Accounting and Budgeting for Development Malaysian Economic Development and Structure Development Research Methods Rich City, Poor Country Demographic Issues and Theory Modern World System Islam and Development Health, Food and Development Malaysian Social History Consumerism

	Universiti Malaya	Universiti Kebangsaan Malaysia	Universiti Sains Malaysia
		Regional Economic Analysis Non-economic Factors in Development Growth and Income Distribution	Education, Development and Society Food and Nutrition Project Evaluation, Planning and Monitoring Technology and Society
Public Administration	Malaysian Politics and Administration Administrator and Society Administrative Decision Making Comparative Politics and Government Personnel Administration Co-operation Comparative Political Strategies for National Development Administrative Management Financial Administration Quantitative Analysis in Public Administration Local Government and Urban Development International Politics Public Enterprise and Development		

III. Institutional Research Programme

1. Major Areas of Research and Sources of Fund

Besides teaching, the other vital responsibility of universities is to conduct and promote research. Indeed, through their research activity, universities not only contribute to the advancement and development of knowledge in the nation, but also to international scholarship. Within the bounds of their role as funding agency, universities can influence the main directions of research. Academic economists in various faculties/schools are involved in several projects. Taken together, it can be seen that there is a preference for projects that are multidisciplinary and which combine academic interest with practical relevance. Research of such characteristics has the advantages of providing stronger foundations for problem-oriented studies and also maximizing the feedback that is mutually beneficial between areas of specialization, thus reinforcing teaching and research. It has also led to the getting together of academic staff from different divisions/departments or even faculties/schools, depending on the disciplinary perspectives of the projects, though studies are also done on an individual basis.

To participate actively in this academic activity, researchers must have access to reliable and generous financial support. This is because money is needed for purchasing supplies, employing field assistants, field travel, and other expenses. The budgetary requirements are predominantly fulfilled by centralized research funds and administered and supported by the respective universities. Nevertheless, because of increasing competition for these funds, researchers also solicit and receive grants from outside agencies -- national (government or otherwise) or international, such as International Development Research Centre, Canada, Institute of Developing Economies, Tokyo, and various United Nations organizations, such as ESCAP, ILO, UNFPA, and Unesco.

The Centre for Policy Research is an autonomous research institute established in 1971 at USM. It undertakes research projects which are mainly government-sponsored, and require full-time commitment by staff and involve large scale employment of project personnel. Most of the projects undertaken by this Centre are problem-oriented and multi-disciplinary in character.

In carrying out their research activities, academic economists in the universities do experience some constraints: both financial and institutional. These shall be examined in the subsequent section.

2. List of Researches done 1979-81

The list of research projects carried out by economists in Malaysia is given below:

A. Analytical Economics/Economic Analysis and Public Policy/Economics

1. Joint ventures in Malaysia
2. Role of general trading companies
3. Development of Malaysia financial institutions
4. Comparative advantage of textile and cement industries in Malaysia
5. High and low performance of family planning clinics in West Malaysia
6. Social and psychological aspects of fertility and family planning behaviour - The case of Penang
7. Female labour force participation
8. Manpower development in Malaysia
9. Income, consumption, savings of Felda Settlers 1977-1980
10. Small Bumiputra enterprises in Kuala Lumpur and Johore Bahru 1978-1980
11. Rural financial markets in Malaysia
12. Fertility, family structure and role
13. Effects of taxes, prices and subsidies in the agricultural sector of Malaysia
14. The demand for economics graduates in Malaysia
15. The effects of macroeconomic variables on income distribution in Peninsular Malaysia
16. US-Japan competition in ASEAN countries
17. The productivity of education and the premium for foreign degrees in LDC's
18. Wage differentials and discrimination: a critique of the 'orthodox' model
19. Labour supply in West Malaysia
20. A study of marital pattern in Peninsular Malaysia

B. Applied Economics/Economic Development and Planning/ Development Studies

1. Financial institutions in Malaysia
2. Migration in relation in rural development
3. Pricing policy and transportation in Malaysia
4. Socio-economic study of plantation labour
5. Regional development in Malaysia
6. Educational growth and structural change in Malaysia
7. The state and development planning - The case of Malaysia
8. The impact of modernization on the role and status of women - A case study of Kejora, Johore
9. Women and children in development
10. Low-cost housing in Penang
11. Ownership patterns of land in the MUDA irrigation scheme
12. Rural-urban relations in Kedah and Kelantan
13. Demographic change and land development in Peninsular Malaysia
14. Life insurance companies as financial intermediaries
15. Study of marriage and marital dissolution in Peninsular Malaysia

C. Rural Development/Agricultural and Resource Economics

1. ASEAN food sufficiency and security
2. Processing and economic use of agro-industry material
3. Government policy and choice of technology - the rice processing sector of West Malaysia
4. Small-scale fisheries development in Peninsular Malaysia
5. Padi and rice processing in West Malaysia
6. Energy policies in ASEAN
7. Fisheries policies in Peninsular Malaysia

8. A socio-economic study of fresh water fish in West Malaysia
9. Rice Stockpile in Malaysia
10. The pattern of poverty in rural areas - Rembau District, Negri Sembilan
11. Small-scale fisheries in Peninsular Malaysia
12. Rural financial market in West Malaysia (part of a three countries comparative study involving the Philippines, South Korea and Malaysia
13. Cost of production for agricultural enterprises
14. Economic analysis of piggery waste treatment

D. Accounting

1. Empirical study of management and the organization
2. State auditing in public enterprises
3. Consolidated accounts and equity basis of accounting
4. Financial reporting practices in Malaysia
5. Management information systems in Malaysia
6. The bauxite cartel: success or non-entity?
7. Statistical sampling and management accounting
8. Legal liability of auditors
9. Financial reporting in Malaysia
10. Computerized financial accounting

E. Business Administration

1. Corporate code of conduct of Malaysian companies
2. Wage structures in HAWA type industries
3. Commercial marketing of contraceptives in Malaysia
4. Joint venture companies in Asia
5. Awards of Malaysian Labour Arbitration Courts and Tribunals - 1965 to 1975
6. The machinery for settling labour disputes in the Malaysian private sector
7. Capacity expansion planning

8. Financial incentives for the promotion of small business
9. Commercial marketing of contraceptives in Malaysia: profile of nonprogramme user
10. Some issues on the National Unit Trust of Malaysia
11. Trade-in-services: joint ASEAN-Australia research project
12. Corporate social responsibilities undertaken by Malaysian companies

F. Public Administration

1. Public enterprises and development in Malaysia
2. Social and psychological aspects of fertility and family planning behaviour - Penang
3. Public administration in Malaysia
4. Status of state economic planning units
5. Admissions to undergraduate education in Malaysia: a case study of the University of Malaya
6. Problems of population research and its utilization in Malaysia
7. Technology transfers in the iron and steel industry: the Malaysian experience
8. Applications of quantitative techniques in public administration

G. Statistics/Economic Statistics

1. Stable type densities for large deviations
2. Life table models
3. Changeover design
4. Redistricution impact of public policies in Peninsular Malaysia
5. Various aspects of computer usage in Malaysia
6. Energy and optimal petroleum production policy - Malaysian
7. Approximation of probability for recurrent events
8. Stable type densities for large deviation

9. Urbanization
10. Assessment of the posterior of ARMA parameters when given an informative prior
11. Impact of nuptiality on fertility trends in Peninsular Malaysia, 1957-1980

IV. Problems of the Profession

The basic philisophy of Malaysian universities is 'to concentrate on the production of high-quality graduates' to meet the continual demands for expertise in the country. In this context, academics should be sufficiently motivated to do their job. The teaching they do determines the quantity and quality of human capital investment, while their research provides a new source of ideas and innovations vital for a developing country. Thus they should be duly rewarded.

In choosing an academic career, individuals are not completely motivated by money wages. Other factors such as opportunities for creativity and intellectual pursuits are also important, and they can help to enhance job satisfaction. The major problems faced by professional economists in the universities in Malaysia are briefly examined here.

1. The Academic Reward Structure

In addition to the salary and other monetary rewards listed there are also non-monetary or intrinsic benefits in pursuing an academic career. While the monetary factors include mainly the tangible rewards obtained in the profession, the intrinsic ones refer to the characteristics of the job itself and the work environment. For example, the work of an academic provides scope for creativity and variety in a wide range of activities covering teaching, research, administration and outside consultation. The non-monetary rewards are in the form of opportunities for self-development through the acquisition of greater skills, as well as professional activities through working and researching in one's own field of professional specialization. Thus both forms of rewards contribute to satisfaction (or dissatisfaction) with the career.

In spite of the recent adjustments in the gross salaries of academics to the rising cost of living by payment of allowances (such as housing subsidies and entertainment and civil service allowances), low financial returns and poor promotion prospects are two of the common disappointments in the universities. This leads to adverse effects on the general spirit of the academic community and consequently, affects the quality of their academic work.

Furthermore, although these allowances have helped reduce the wide salary differential between professional economists in the universities and their counterparts elsewhere, various deficiencies still remain in the academic reward structure. Uniform incremental salary scales bring about a certain degree of inflexibility. This can be explained as follows. Once an individual's starting salary is fixed by the university concerned, his annual increments are inevitably determined by the salary structure. However, his salary will stangnate at the maximum point of the particular scale unless he moves to the next higher grade, and hence higher scale.

Another outstanding limitation is that tutors, especially those who have already been conferred their Master's degree in Economics, are paid according to the scale which has a maximum salary of only M$1,600. This is significantly lower than that enjoyed by school teachers with Diploma of Education as well as the civil servants, who only have a bachelor's degree.

A poorly designed reward structure can also affect the manner in which the academics divide their time and effort among the various activities. For example, if income is insufficient, some academics would be required to supplement their university salaries by spending more time on outside work. Indeed, this is a common problem among academics in many countries of this region. When undertaken excessively, such work becomes detrimental to university work.

Thus the reward system should be structured to incorporate a promotion system that recognizes merit and seniority. Research should also be given its due place as a criterion for academic advancement. Indeed, a more flexible and fair way of rewarding academics would certainly go a long way towards greater commitment to their work.

2. Research and Training

Besides individual initiative and enthusiasm, and the capability for undertaking research, academics must also have the means, the time, and the inducement to do research. In this respect, what a university can do is to lay the groundwork for promoting productive research. It is important to emphasize that researchers lack funds to purchase books and equipments needed for their professional work.

Some of the common difficulties faced by academic economists in the three Universities are:

(i) lack of funds

(ii) lack of time to engage in research

(iii) inadequate and non-dependable secondary data

(iv) insufficient contact with other workers in the same field, and

(v) the somewhat restrictive regulations.

The financial constraint is a serious one as it slows down research progress, especially in large-scale projects. It also determines the character and scale of projects undertaken, for example, if the estimated financial resources are not approved up to the amount applied for, then investigations will have to be cut down.

The pressure of time arises from work including teaching and commitments such as administrative work and marking of examination scripts. This problem is particularly felt by those staff members who need time badly for their research and study in order to attain advanced degrees.

Although a number of government agencies, such as the Department of Statistics, have gathered data of specific interest to them, academics face a situation where there is inadequate data for purposes of university research. This means that to widen the scope of the research, researchers have to concentrate on the routine and systematic procedure of collecting data which suit their needs; besides basic data analysia.

Other than a few links with government-run institutes, the available research talent within the academic community is hardly tapped by the private sector. One can safely say that it is a situation where a national research community does not exist, with which academic researchers in the same field could be associated. There is a general feeling among some academics that restrictive regulations, which affect the freedom of academics to conduct research on projects of their own choice without undue constraints, can stifle initiative and creativity.

Thus financial support and other facilities in the form of well-stocked libraries and the congenial academic atmosphere are essential for active involvement in research. Nevertheless it cannot be derived that within the set of operative constraints, academic economists make the best use of the resources available.

Although research and teaching constitute a kind of on-the-job training, staff training and development is an integral part of an academic career. Opportunities for attaining advanced degrees are available locally as well as overseas. The Academic Staff Training Schemes of the universities serve to fulfill part of the needs for financing overseas study by members of the staff.

3. Concluding Remark

Economics in Malaysia is still a younger discipline, and most of teaching is done at the undergraduate level. Because of lack of trained manpower, not much research has been carried out by indigenous scholarship. Thus there is a wide virgin territory of research in Malaysia, and a challenging opportunity for local economists to research and to contribute to the country's planning and economic development. Concerted action is needed to give boost to economics teaching and research in Malaysia.

SEVEN

THAILAND: *Unchalee Kohkongka*

I. *Brief History of the Discipline in Thailand*

The Thai economy developed from a static system of self supply to a dynamic system of international trade and infrastructural development. This has resulted in significant changes in the way of life of the Thai people.

Michael Buchman [1] examines the economic development of Thailand (Siam) from the middle of the past century up to the present. Referring to Rostow's theory of economic growth, [2] Buchman distinguishes three periods in Thai economic development: the *traditional society,* that is the economic situation of Siam in the 18th century and the early 19th century, the *precondition for take off,* which began with the "Bowery Treaty" of 1855 and ended when multiple rates of exchange were abandoned in 1955, and finally the so-called *take off* period, which began in 1955 and still continues.

The early Siam was that of a *traditional society* and was marked by self-sufficiency.

With the so-called Bowery-Treaty between Siam and Great Britain, the *first phase of precondition for take off* was introduced (1855-1884). The whole *precondition for take off* phase was characterized by the change of Siamese economy from a static system of self-supply to a dynamic system of international trade and infrastructural development. The main impulses for this change came from outside the country. With the Bowery-Treaty

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[1] Michael Buchman; *Die wirtschftliche Entwicklung Die Wirtschaftsstruktur, Landermonographie Thailand* (Horst erdmann verlag Tubingen 1981)

[2] W.W. Rostow wrote the influential book *"The Stages of Economic Growth"*

These stages are:

1. Traditional Society
2. Preconditions for take-off
3. Take off
4. Maturity
5. The Age of High Mass-Consumption

King Mongkut intended to open his country to new European ideas. At the same time, the British colonies urgently needed rice. To produce a surplus of rice in the country, however, it was not necessary to intensify agricultural production, as it was still possible to produce more by expanding the area under cultivation. For this reason foreign businessmen started investing money in Thailand.

The second phase of precondition for take off (1884-1925) is characterized by the development of institutions and infrastructure. Under the reign of King Chulalongkorn the peasants had to pay taxes instead of making agricultural contributions. In 1884, the first primary school was founded and in 1887 the Siam Electric Company started generating electricity, to meet supply needs of Bangkok. Industrial production for the purpose of meeting local demands began. The surplus from agricultural production and from mining was used to establish the home industry. Further, the monetary surplus was used to maintain national reserves in the form of gold and silver.

The third phase of precondition for take off (1926-1955) is marked by strong political influence on economic development. The revision of foreign trade treaties in 1926 led to the financial independence of Siam. The expropriation of Chinese and European works was a consequence of the 1932 palace revolution and the world economic crisis. As a consequence of World War II, the Thai government was forced to introduce multiple rates of exchange. They were abolished in 1955, marking the beginning of the *period of take off,* or the emergence of self-sustained Thai economic growth.

In the post-war period the drive of global capital accumulation increasingly necessitated a further integration of underdeveloped countries into the new international division of labour.

The new international division of labour (NIDL):

1. undermines the traditional bisection of the world into a few industrialized countries on the one hand, and a great majority of developing countries integrated into the world economy solely as raw material producers on the other, and
2. compels the increasing sub-division of manufacturing processes into a number of partial operations at different industrial sites throughout the world.

In the new pattern of international division of labour, for the first time in centuries, the underdeveloped countries are becoming manufacturing sites on a tremendous and growing scale. Concomitantly, the production process could be increasingly fragmented into a variety of partial operations to be performed world-wide at different locations. This has happened as part of the process of the world-wide reorganization of industrial production stemming from changed conditions for capital expansion. These changed conditions include: the existence of a world-wide industrial reserve army or inexhaustible supply of unemployed cheap labour in underdeveloped countries; efficient transport, communication and information technology which render the industrial location and the control of production less and less dependent on geographical distance; and finally, the possibility of a far-reaching subdivision of production processes into fragments that will enable even unskilled labourers to perform otherwise complex operations after a short period of training.

The NIDL has, therefore, brought about world market-oriented production in the underdeveloped countries which comprises "both production for the domestic markets of the host countries *(so-called import substitution)* and production for markets traditionally supplied by the industries of the advanced countries themselves *(so-called export production)*.

The concern with economic development has given an impetus to the study of economics and has promoted research on several new frontiers on knowledge. Introduction of teaching and research in Thailand was also influenced by these factors.

By the end of the 19th century the economics discipline had already been well formulated in Europe, but in Thailand interest in economic study was just beginning. The economy was totally administered by the absolute monarchy whose only economic interest was mobilization of resources for the maintenance of the government and the court. The absolute monarchy in Thailand (then called Siam) did not feel concerned with economic efficiency and resource allocation, or with economic development. This is evident from the fact that less than 10% of the government budget was allocated to infrastructure development. The main function of the government was to preserve peace and stability, not to provide economic services.

There was very little change when King Rama VI established the Chulalongkorn Civil Service College in 1911 (later to become Chulalongkorn University in 1917). A Faculty of Public Administration was created which was composed of two departments at the diploma level: a Public Administration Department and a Revenue

Department. The Revenue Department had no course in economics; it was responsible for providing training in tax collection. At the degree level, there was a public administration programme, with one course in introductory economics. The course concentrated on the theory of value and international trade. The main purpose of the faculty of public administration was to train personnel for the civil service. Public finance administration rather than economics was the focus of teaching. Even at the degree level economics was only taught as a supplementary subject.

A serious attempt to spread the knowledge of economics in Thailand was initiated by Phya Suriyanuwat in 1911. His book entitled *An Introduction to the Science of Wealth,* explained classical value theory and provided examples drawn from the economy of Thailand. Most importantly, the book introduced the idea of resource mobilization for economic development, and strongly urged the Thai government to assume a more active role in the country's economic development. The author also stated that a great disparity on income and wealth distribution existed in Thailand.

Unfortunately his progressive book met with a very unfavourable response in those days. A critique of the book appeared in a Thai Navy journal. It was felt that the discipline of economics was useless and inapplicable to Thailand, and subsequently, the government promulgated a law forbidding the teaching of economic doctrines. It was contended that Thailand had not yet reached a stage where the division of labour theory could be applied.

Growth of the Discipline

This situation lasted for many years. Then, in 1933 as Dr. Pridi Phanomyong, the ideologist of the revolution, created the University of Moral and Political Science (UMPS) where the faculty of public administration of the Chulalongkorn University was transferred. The aim of the university was to educate Thai citizens to live under the new constitutional regime.

All students at the university registered first for a bachelor of law degree. Two courses in economics were introduced at the bachelor degree level, one dealing with economic doctrines and the other with economic principles. Students could also work for a Master's degree in economics after finishing the Law degree. The syllabus of the Master's degree was comprised of courses on the history of economic doctrine, advanced economics, industry and labour law, public finance law, banking and credit institutions, accounting and general practices in various fields of government. This was the first time that economics was taught as a district course in a Thai university. Since some of the university instructors were trained in faculties of law in French universities where the influence of the German Historical School was paramount, the methodology of some economic courses at this new university was influenced by the inductive historical approach. At the graduate level, the Master of Economics programme had only two courses in economics, namely the history of economic doctrines and advanced economics offered in law and public administration.

Political factors hindered the further progress of economic studies in Thailand. The economic plan of Dr. Pridi was attacked by his political opponents as being a "communist plan." 1/ Dr. Pridi and his faction were severely suppressed. The Faculty of Economics of the UMPS functioned with a small number of students through the 1950s.

Instruction in economics at other universities began after the Second World War.

That economics instruction at other universities was more professional and career oriented was evident from the specialized nature of the programme. At the agricultural Kasetsart University the faculty of co-operative science and economics was established in 1953 with its specialized programme in agricultural economics. At Chulalongkorn University economics courses were taught as supplementary courses in the public finance and commerce programmes.

Around 1960 the study of economics in Thailand took a new turn when the military government under Field Marshal Sarit Thanarat took a serious interest in economic development. A World Bank mission visited Thailand in 1959 and recommended that Thailand draw up an economic development plan. In 1961, the first six-year economic development plan of Thailand was promulgated. The government began to employ more economics graduates; especially in its technical and planning departments. The image of an economist in the eyes of the government had changed. Instead of regarding economists as radicals, the government began to view economists as technicians. Economics development requires economists for planning, and in any case most of the new generation of economists took the neo-classical approach to economics at least ostensibly, thus eliminating the political element from economic analysis.

1/ "Communist plan" in the sense that Marx used it.

TABLE 1

Qualifications of the Economics Teaching Faculty in Various Thai Universities 1979

	Name of University						Total
	Thammasat	Chulalongkorn	Kasetsart	Chiangmai	Ramkhamhaeng	NIDA	
Ph.D	27	15	13	5	3	11	74
M.A	45	45	53	17	46	5	211
B.A	5	8	16	4	11	-	44
With Lower Qualification	-	1	-	1	-	-	2
Total	77	69	82	27	60	16	331

Source: Office of State Universities, Thailand (Update)

TABLE 2

Distribution of the Countries of Study of Thai Economic Faculty (1980)

Thailand	85
U.S.A.	84
Philippines	11
Australia-New Zealand	9
United Kingdom	5
Japan	2
India	2
France	1
Taiwan	1
Malaysia	1
Sweden	1
Total	202

After Dr. Puey Ungphakorn, formerly the Governor of the Bank of Thailand, was appointed Dean of the Faculty of Economics at Thammasat University (or UMPS) in 1970, the number of permanent faculty members increased, the syllabus was revised and the library was modernized. Simultaneously, the faculty was supported vigorously by the Rokefeller Foundation through the visiting professorship programme and scholarship funds.

In 1964, for the first time, economics was taught outside of Bangkok at Chiangmai University in the Social Sciences Faculty. Another important institutional reorganization took place in 1970 when the Department of Public Finance of the Faculty of Political Science and the Department of Economics of the Faculty of Commerce and Accounting at Chulalongkorn University were integrated into a separate Faculty of Economics.

In 1966, the National Institute of Development Administration (NIDA) was established with the purpose of training personnel in development administration at the graduate level for the civil service and business. Economics was also included in the graduate syllabus of NIDA.

With the expansion of economic teaching, the number of full time economic University members increased to 331 in 1980. The break down is as follows: Thammasat, 77; Chulalongkorn, 69; Kasetsart, 82; Chiangmai, 27: NIDA, 16; and Ramkhamhaeng, 60.

The study of economics in Thailand still tended to serve the state and its government. This was especially true of the training of competent personnel for the civil service to perform economic functions, such as work concerning revenue and the budget, the monetary system, agricultural statistics, etc. The teaching of economics was primarily the training of professional specialists and technicians.

II. Infrastructures for Teaching and Research in Economics

At present a study of economics at the university level is offered at 6 state universities: Thammasat, Chulalongkorn, Kasetsart, Chiangmai, Ramkhamhaeng, and Sukhothai Thammathirat. A training institution NIDA also has a graduate programme in development economics. Just recently, three private colleges, the Commerce College, the College of Business Administration, and Krirk College were permitted to grant degrees with a specialization in economics.

There are two reasons for the specialized nature of economic programme in Thai universities.

1. *The Objective of the Programme:* The objective is to train specialists in economics, capable of performing the technical, economic jobs. Such jobs would include for example, the collection of economic data, project evaluation, correlation and regression analysis, banking operation, revenue collection and budget allocation. This professional-oriented training has dominated university teaching in Thailand since its inception.

2. *The Structure of the Economic Teaching Units in Thai Universities:* With the exception of Chiengmai University, the economics courses in Thai universities are the responsibility of the faculties of economics. These faculties are independent of other faculties. This administrative arrangement tends to make each faculty self-contained and inward-looking. Usually their relationship with the faculties teaching political science and history is weak and non-institutionalized. The economic curricula, therefore, do not include enough advanced subjects in the fields of history and other social sciences. To enhance the economics instruction at Chiengmai University an interdisciplinary programme was begun within the Faculty of Social Sciences.

Courses in economics taught in various universities and colleges are presented below:

Universities

1. *Chulalongkorn University: Faculty of Economics.*
   - Quantitative Economics
   - Economic Theory
   - Monetary Economics and Public Finance
   - Economic Development
   - International Economics

2. *Kasetsart University: Faculty of Economics and Business Administration.*
   - Economics
   - Agricultural Economics
   - Accounting
   - Business Administration
   - Co-operative Economics

3. *Chiangmai University: Faculty of Social Sciences.*

- Accounting
- Business Administration
- Economics

4. *Thammasat University: Faculty of Economics.*

- Economics
- Economic Theory
- Econometrics
- Monetary Economics
- Public Finance
- International Economics
- Economic Development
- Industrial Economics
- Economic Statistics
- Applied Economics

5. *Ramkhamhaeng University: Faculty of Economics.*

- Financial Economics
- Monetary Economics
- Quantitative Economics
- Economic Theory
- International Economics
- Economic Development
- Industrial Economics
- Agricultural Economics
- Economics of Human Resource
- Historical Economics

Colleges

1. *College of Commerce: Economics.*

- Business Economics
- Finance and Banking
- Economic Theory

2. *Krirk College: Economics.*

   - Finance and Banking

3. *College of Business Administration: Economics.*

   - Economics

The Faculty of Economics of Thammasat University offers course leading to a Bachelor of Economics degree. The Faculty of Economics and Business Administration at Kasetsart University offers a Bachelor of Science programme with possible specialization in agricultural economics, co-operative science, economics, business administration or accounting. At Chulalongkorn University professional economists were trained both in the Faculty of Political Science and the Faculty of Commerce and Accounting. The Faculty of Political Science awarded the degree of Bachelor of Political Science with a specialization in financial administration while the Faculty of Commerce and Accounting offered courses leading to a Bachelor of Economics. Since 1970, however, Economics at Chulalongkorn has had a Faculty of its own. At Ramkhamhaeng University, professional economists were trained at the Faculty of Business Administration between 1971 and 1973 after which time a Faculty of Economics was established where a degree of Bachelor of Economics could be pursued.

In fact, official designations for economics degree may not bear a close relationship to the curriculum content of these programmes though they appear to have in common the primary aim of training professional economists to meet the particular needs of the public and private sectors. In fact, degrees appear to be named according to the particular role that the department or faculty concerned plays in the over-all framework of a university. For instance, there may be little real difference between the Thammasat degree in economics and the Chulalongkorn Political Science degree with a specialization in Financial Administration, though the latter is so named because it originated in a faculty responsible for training political scientists.

Substantial difference can be found as a result of differences in the general faculty framework of the university into which the economics curricula have to fit. With the divergence in background and historical development, the five universities concerned may not see the training of economists in the same light. For instance, the economics Curricula at Kasetsart University, which is meant to meet the needs of agriculture, includes such subjects from the natural and physical science as chemistry, physics and biology. At Thammasat University, the first year of an economics student is devoted entirely to "liberal arts" subjects, since Thammasat has been reorganized in such a way as to allow "general" education to play an important role. Again, the economics curriculum at the Faculty of Commerce and Accounting, Chulalongkorn University, had to allow for a certain amount of basic knowledge about commerce imparted through such courses as General Commercial Knowledge, and an Introduction to the Legal System.

Thai economics students are, in terms of aptitude, only average students. The most intelligent students in Thailand usually select medicine, engineering and humanities as their fields of higher education. At Chulalongkorn and Kasetsart, the entrance examinations for the economics faculties require tests in Mathematics A and B which are the mathematics requirements for the science-major high school students. People who do not do as well in math become arts major students. For the science-major students themselves, they usually select medicine and engineering as their priorities. Economics is, at best, their second choice. Therefore, Chulalongkorn and Kasetsart's faculties of economics tend to get only the average or below average science-major students, who are not able to enter other more prestigious faculties.

See Table 3 for the number of graduates in economics between 1974 and 1977 broken down by university.

TABLE 3

Numbers Receiving Bachelor's Degree in Economics 1974-1977

University	1974	1975	1976	1977	Total
Chulalongkorn University	98	110	100	112	420
Kasetsart University	458	361	249	303	1,371
Chiangmai University	185	157	134	58	534
Thammasat University	65	69	50	100	284
Ramkhamhaeng University	73	317	563	944	1,897
Total	879	1,014	1,096	1,517	4,506

As mentioned earlier, the study of economics in Thailand is geared toward a specialist career either in the government or in business enterprises. The structure of the economics curricula at various universities reflects this objective. The curricula are specialized programme in economics. At the undergraduate level, courses in economics usually account for approximately 50% or more of the total credit requirement. Table 4 demonstrates this fact.

TABLE 4

Curriculum Structure of Undergraduate Programmes in Economics in Thai Universities

	Credits						
	Chulalomgkorn	Kasetsart			Chiangmai	Thammasat	Ramkhamhaeng
		Co-operative	Accounting	Economic			
A. Basic Courses	61	45	50	51	core-course 66 27	36	48
- Social Science		20	20	20	12	16	18
- Mathmatics & Statistics		7	14	15	12	Math) Science) 8	15
						English) 6 Thai) 6	12
- English		11	10	10	12		
- Science		7	6	6	3	-	3
B. Economic Courses		73	87	88	54	51 * at least	78
C. Non-Economics Courses		26	6	6	24	other12)36 field)* at free 24)least elect-) ive	18
Total		144	143	145	144	132	144

Having decided what kinds of courses we are to develop, the next set of questions relates to the content of the course. The study of economics has been viewed as being spiral in nature, beginning with a basic core. It is thus possible to argue for a single syllabus which would be suitable for all courses of economics at all levels. The depth in which any topic is treated could be a function of the interest, age and ability of the student. Fundamental economic concept in the basic core might include "Scarcity and Choice", "Economic Efficiency", "Income Distribution" and "Aggregate Output and Income", and, if there is a consensus on this, any self-contained course should treat all of these elements.

Within the economics courses of the various programmes, students have to take about 12 credits or 4 courses in economic theory, composed of two courses on micro-economics and two courses on macro-economics. The rest of the credits are distributed among the various fields of economics, of which the most important are international economics, development economics, monetary economics, public finance, agricultural economics and quantitative economics. At some universities other fields are offered, including labour economics, industrial economics, transportation economics, and human resources economics. Students are usually required to vary their course selection, so that there is no over-concentration in any particular field. However at Kasetsart, the B.S. programme in economics greatly emphasizes quantitative economics.

The most striking characteristic of the content of economics courses is the emphasis on neo-classical and Keynesian economic theories. The four compulsory courses on economic theory which provide the fundamental framework for economic analysis are heavily dominated by neo-classical price theory and the Keynesian theory of income and employment. There is almost no consideration of classical economic theory and the historical approach to economic study. In addition there has been no attempt to develop economic theories based on empirical data on Thailand.

Another characteristic of the content of economic courses in Thai universities is the relative absence of an empirical approach to the study of the Thai economy. At Kasetsart and Chiangmai there is no course on the economy of Thailand. Chulalongkorn, Thammasat and Ramkhamhaeng have two courses on the Thai economy and Thai economic history. Courses on the economics of other countries scarcely exist except Ramkhamhaeng. Chulalongkorn have one course on "Problems of Economic Development in Southeast Asia". Thammasat has a course on the economy of Japan. Ramkhamhaeng has five courses on the "History of Economic

Development of South East Asia," "American Economic History," "Russian Economic History," "Japanese Economic History" and "Economic History of Peoples Republic of China".

At present, Thammasat, Chulalongkorn, Kasetsart, and NIDA offer graduate programmes leading to a Master's degree in economics and a Master's degree in Development Administration. Ramkhamhaeng began to offer the latter course in 1983. Since the graduate programmes are only a continuation of the undergraduate programmes, which are already specialized, it is inevitable that the graduate programmes are even more specialized and very limited in content. The programmes consist of advanced courses on micro and macro economic theory and other specialized fields of economics. At Kasetsart and Chulalongkorn, a Master's thesis is required, while at Thammasat and NIDA a thesis is optional. Students have to study for at least 2 years and obtain 45-52 credits to be qualified for a Masters' degree. Ramkhamhaeng University has two plans: Plan A, which requires a thesis and research; Plan B. which requires a comprehensive study. Both plans require at least 45 credits.

III. Major Trends in Research both Theoritical and Applied

Research and Application

Economic research in Thailand is at an embryonic stage. In fact it is a post-1960 endeavour. When the term "research" is mentioned in Thailand it tends to arouse two distinct mental images. One mental image is that research implies serious, persevering and time-consuming undertaking. This seems to represent the view of the public in general. Another mental image is substantially the same as above, plus the assumption that the research is of quantitative type. This second type of mental image appears to dominate various scholarly and professional circles, within governmental organizations and academic institutions. Due to the widespread influence of this latter quantitative image associated with the term "research", qualitative (e.g. historical) research interests exhibit a low profile in the Thai milieu.

Before the second World War there were two significant rural economic surveys, one conducted by Carl C. Zimmerman in 1930-1931 and the other conducted by Jane M. Andrew in 1934-1935. In addition to these studies there were only the annual reports of the financial advisers starting in 1901 with analysis focused primarily on the country's budget and the balance of payments. Following World War II, Thammasat University initiated a thesis programme for a Master's degree, thus originating economic research in a teaching institution. In 1952, the first Master's degree in economics requiring a thesis was granted at Thammasat. This research heavily concentrated on monetary economics and public finance.

In conjunction with the increasing interest in economic research, research in the other social sciences developed rapidly also. At Chiangmai University a Tribal Research Centre was set up in 1964. The Tribal Research Centre is administered by the Public Welfare Department which is under the Ministry of the Interior, while Chiangmai University has been under a separate governmental agency. Nevertheless, there has been close co-operation between the Centre and Chiangmai University, particularly through its Sociology-Anthropology Department. The Tribal Research Centre takes charge of ethnic studies, i.e. studies of tribal people in the northern part of Thailand. The studies are generally social scientific (mainly anthropological, and psycho-social) in nature. Scholarships and fellowships have been granted by foreign governments, such as those of Australia and France for the Centre's personnel to receive further training. International experts have also been enlisted. After some twenty years of existence the Centre has been much lauded for its research work on the tribal groups.

Social science research projects of various kinds have also been launched by other academic institutions. In the domain of ethnic relations, prince of Songkhla University, particularly its Pattani campus, has been engaged in studying socio-cultural relations between Thai Buddhists and Thai Muslims. Another regional University, Khon Kaen University, established over 15 years ago, is a late comer in social science teaching and research. It has, however, begun to contribute to our understanding of socio-economic problems in the Northeast.

Research activities have recently been increasingly emphasized since research is a criterion for academic promotion. The imperative to "publish or perish" in academic circles is finally coming to Thailand. This requirement has stimulated more and more research of varying quality.

In addition to the influence from the growth of universities, social science research in Thailand received an important impetus from the founding of the National Research Council of Thailand (NRCT) in 1959. The NRCT has been charged with such responsibilities as the formulation of research policy and the promotion of research activities. In 1977 the NRCT revised its research policy and planning in accordance with Thailand's Fourth-Five-year plan for the period of 1977-1981 resulting in the following guidelines:

(1) Research work must aim at promoting the welfare, capability and well-being of the people;

(2) Research enterprises must be conducted with the express purpose of solving economic and environmental problems in order to maintain national integrity and national culture.

(3) Research activities must enhance technical knowledge conducive to the development of science and technology.

The NRCT has played significant role in the promotion of research activities. Despite its modest budget, the NRCT has tried its best to fulfil its responsibilities. It is supposed to promote research in two areas: the physical sciences and the social sciences. The term "social sciences" as used by NRCT has a very broad meaning. It emcompasses philosophy, psychology and education as well. Presently, the task of promoting social science research is specifically entrusted to five committees, namely those dealing with research in political science and public administration, economics, sociology, law, and philosophy (psychology and education are included in this category).

To cite some interesting figures, Table 5 shows that out of 80,530 graduates, only 958 persons have gone into research. Table 6 indicates that research is carried out by every ministry, not just by universities, or the NRCT. A recent annual budget for research totaled over 243 million baht (US$1=27 Baht). Table 7 shows that over 31 per cent of research money requested in 1977 was for economic research projects. Table 8 indicates that between 1963-1979, international researchers undertook 279 projects in the general social science category, representing a share of 59.52 per cent of all of the research in related fields (i.e. including humanities, education, fine arts, and law). Table 9 shows that out of 669 international researchers doing social research in Thailand, 319 persons, or 47.68 per cent, were Americans.

TABLE 5

Social Science Graduates versus Social Science Researchers

Field	Graduates	Researchers
1. Humanities	51,003	400
2. Law	8,796	22
3. Political Science and Public Administration	5,051	91
4. Economics	13,627	298
5. Sociology	2,053	147
Total	80,530	958

In terms of percentage, out of 80,530 graduates or those with higher degrees in social sciences, only 958 or a little bit higher than 1 per cent go into research.

TABLE 6

Government Budget Allotted for Social Science Research
(From all Ministries)

Field	Thousand Baht	Per Cent
1. Economics	26,167	35.32
2. Sociology	72,484	29.71
3. Political science and Public Administration	56,779	23.27
4. Philosophy (including Education and Psychology)	24,498	10.05
5. Law	4,009	1.65
Total	183,937	100.00

TABLE 7

Research Funds Requested from the National Research Council 1977

Field	Baht	Per Cent
1. Economics	416,564	31.56
2. Sociology	319,400	24.19
3. Political Science and Public Administration	283,600	21.48
4. Philosophy	270,985	20.53
5. Law	29,500	2.24
Total	1,320,049	100.00

TABLE 8

Social Science and Related Research Projects Undertaken by Foreign Researchers (1963-1979)

Field	Number of Projects	Per Cent
1. General Social Science	279	59.52
2. Humanities	149	31.90
3. Education	25	5.36
4. Fine Arts	13	2.79
5. Law	2	0.48
Total	468	100.00

TABLE 9

Foreign Social Science Researchers in Thailand

Country	Number of Person	Per Cent
U.S.A.	319	47.68
Japan	91	13.60
England	59	8.81
Federal Republic of Germany	38	5.68
Denmark	35	5.23
France	30	4.48
Australia	21	3.13
Unspecified	76	11.36
Total	669	100.00

Research Funding

Research funds are available from various sources, both internal and external. Internal or domestic support for research is mainly from the government budget. Each college or univeristy is allotted a certain amount of funds for research or applied. Research is mainly carried out by faculty and staff with a number of student assistants. Some universities, e.g. Chulalongkorn University and Ramkhamhaeng University, have sizeable extra-budgetary incomes, which come from either the management of properties or from enrolment fees (Ramkhamhaeng University, and open admissions institution, has more than 300,000 students.) Such universities can finance research projects with their own funds.

As far as other government agencies are concerned, they normally draw research funds from the national budget. Research activities are carried out by their own personnel. Some government offices such as the National Economic and Social Development Board (NESDB), or the Community Development Department of the

Ministry of Interior, do commission research projects to outside scholars.

Apart from the national budget the private sector or philanthropic foundations do provide research funds. For example, the Bangkok Bank recently contributed a certain amount for a project on identifying Thai national characteristics.

Research funds from external sources include those from foreign governments or foreign foundations. The Ford Foundation used to play an active role in educational research. But due to a policy change it has greatly curtailed funding for research in Thailand; in fact, it has wound up its office from Bangkok. In the past 25 years American foundations, including the Asia Foundation, have been active in giving grants for various types of social science research. Now German foundations, e.g. Friedrich Ebert Stiftung and Volkswagen Foundation and Japanese foundations are conspicuous on the scene.

Major Areas of Research

There was little economic research in Thailand before 1960. The early 1960s were clearly dominated by research on the Thai agricultural sector, in which the market structure and consumer prices of various farm products were analyzed. After 1965, research began to diversify to cover other fields like economic development, monetary economics and public finance, industrial economics and labour economics. Significant researches with a problem solving orientation were carried out by noted senior government economists such as Vichitvong Na Pombhejara (industrial economics, economic policy), Sanoh Unakul (economic policy and planning), and Nikom Chandravithum (labour economics).

After 1970 the methodology of analysis began to include the use of mathematical and econometric tools. Pioneering works applying econometric methods to Thai economic data included research studies by Chinawoot Soonthornsima, Udom Kerdpibue, Warin Wonghanchao, Olarn Chaiprawat, and Virabongsa Ramangkura.

TABLE 10

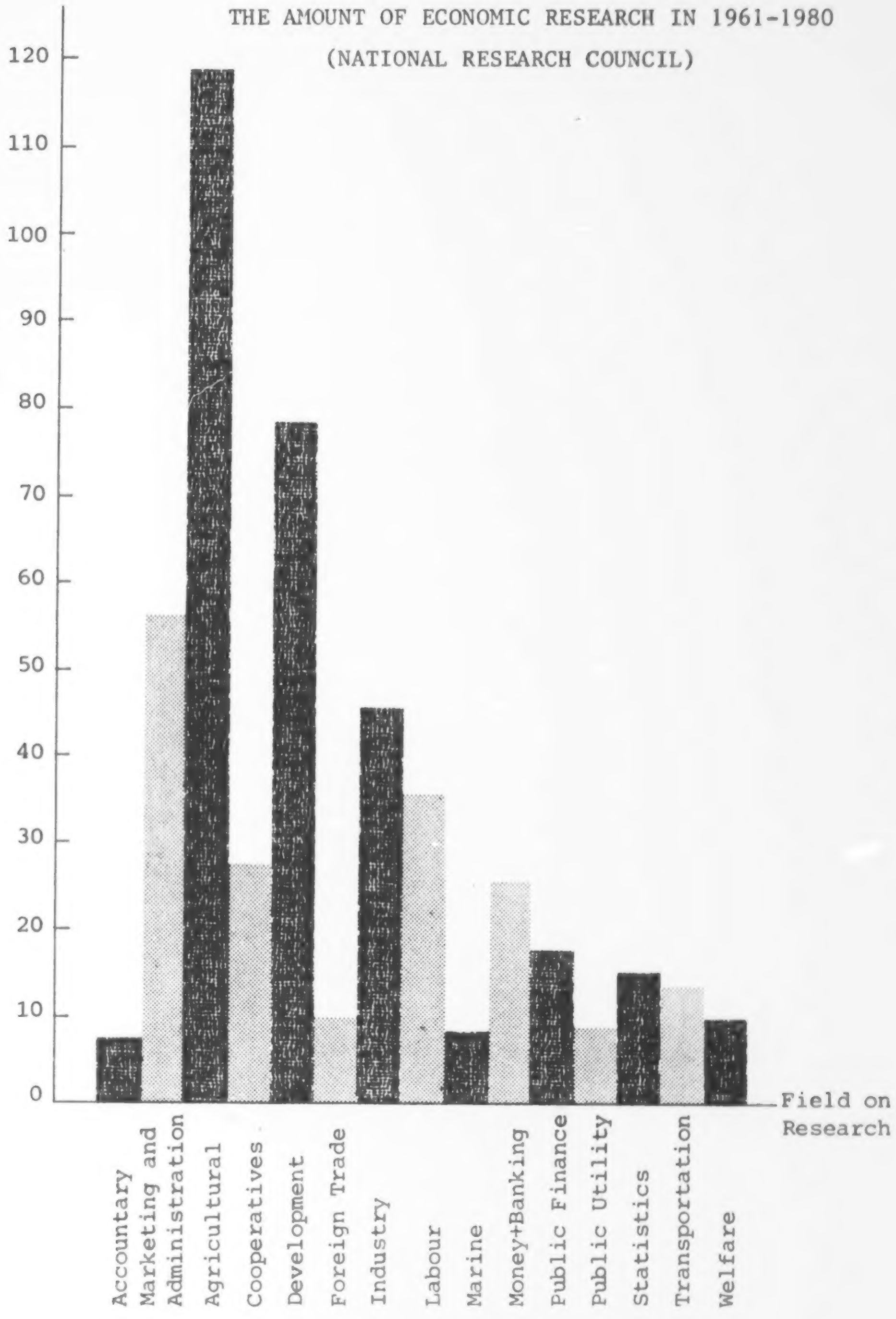
Research Projects in Different Subfields of Economics
Source: National Research Council — 1961-1980

Subfields of Economics	1961-1970	1971-1980	Total
1. Accounting	-	5	5
2. Marketing and Administration	-	58	58
3. Agriculture	13	106	119
4. Co-operatives	-	27	27
5. Development	11	69	80
6. Foreign Trade	3	8	11
7. Industry	3	41	44
8. Labour	5	31	36
9. Marine Resources	1	4	5
10. Money and Banking	4	20	24
11. Public Finance	5	12	17
12. Public Utility	1	5	6
13. Statistics	3	12	15
14. Transportation	2	8	10
15. Welfare	-	7	7
Total	51	413	464

TABLE 11

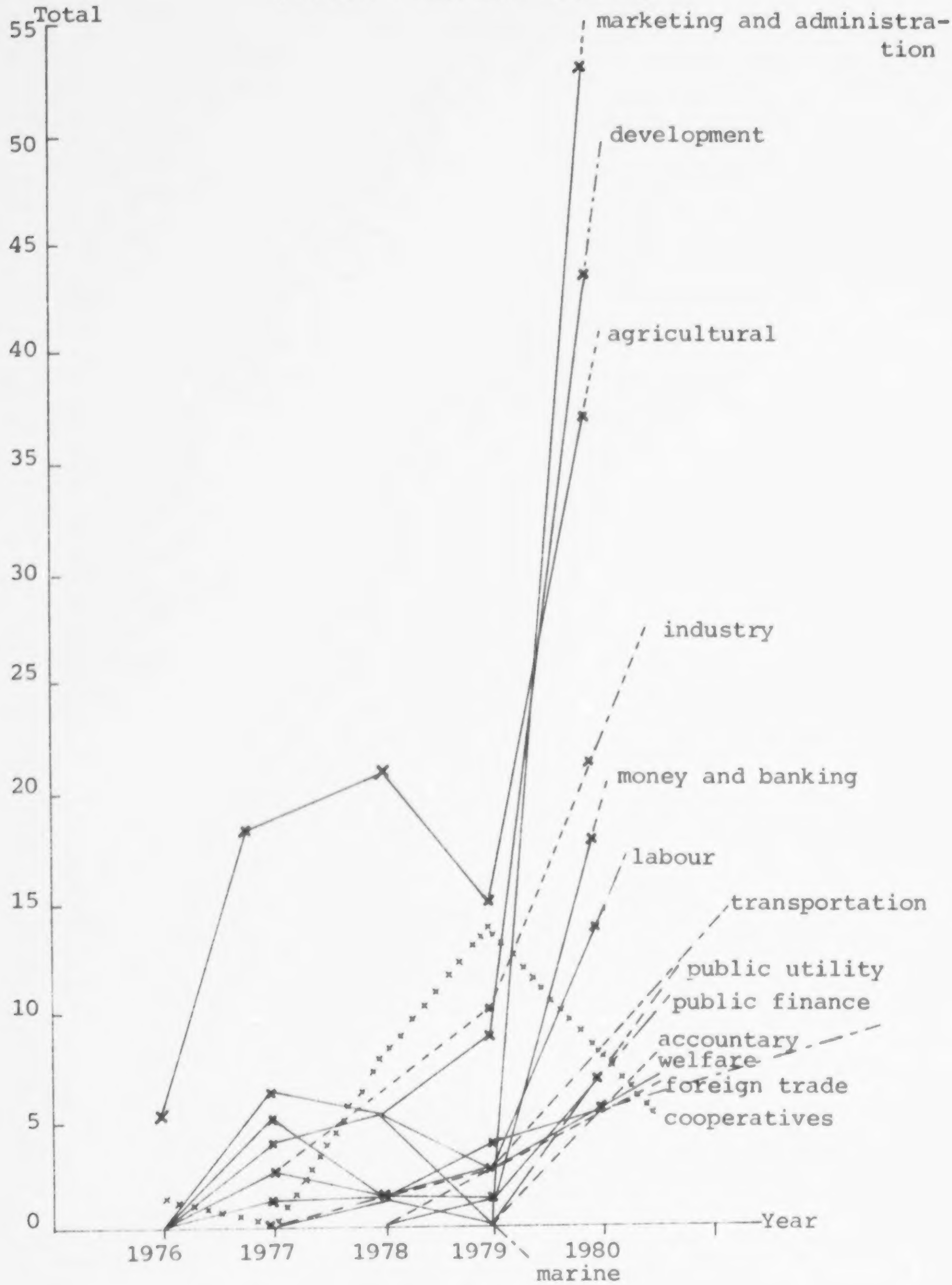
Fields Classification Research
(Source from the National Research Council) 1960-1981

Year / Field of Economics	1961/ 1965	1966/ 1970	1971/ 1975	1976/ 1980	1976-1980(per year)					Grand Total
					'76	77	78	79	80	
Accountancy	0	0	0	5	-	-	1	-	4	5
Marketing and Administration	0	0	0	58	-	1	1	-	56	58
Agricultural	4	9	12	94	3	18	20	15	38	119
Co-operatives	0	0	0	27	1	-	6	14	6	27
Development	1	10	8	61	-	5	4	7	45	80
Foreign Trade	0	3	1	7	-	-	1	2	4	11
Industry	2	1	4	37	-	1	5	8	23	44
Labour	3	2	8	23	-	3	4	2	14	36
Marine Resources	0	1	0	4	-	-	4	-	-	5
Money and Banking	4	0	1	19	-	-	-	1	18	24
Public Finances	1	4	3	9	-	2	1	1	5	17
Public Utility	0	1	0	5	-	-	-	-	5	6
Statistics	0	3	0	12	-	4	1	3	4	15
Transportation	1	1	0	8	-	-	-	2	6	10
Welfare	0	0	1	6	-	-	1	1	4	7
Total	16	35	38	375	4	34	49	56	232	464



THE AMOUNT OF ECONOMIC RESEARCH IN 1961-1980
(NATIONAL RESEARCH COUNCIL)

TREND OF ECONOMICS RESEARCH IN 1976-1980
(NATIONAL RESEARCH COUNCIL)



The methodology of economic research in Thailand has recently become more mathematical. This trend could become harmful if the concentration on mathematical methodology leads to the neglect of other methods of study. Mathematical analysis is only one useful tool and is not a substitute for theories, concepts and applied research. Research in economics using historical and institutional theories should consider an inter-disciplinary approach as most appropriate.

The application of results gained from economic research and analysis by public and the policy-makers in Thailand is currently rather limited. It would seem to be desirable to increasingly integrate applied economics into policy making in order to promote the nation building efforts of the country. It is felt by the public that politics often overrides recommendations based on economic rationale. The urgently needed reorganization and improvement of the present tax system, land reform, and population policy are some of the areas in which economists can make effective contribution through research.

IV. Problems the Profession and Professional Economists Face in Teaching and Research

The crisis in higher education in Thailand today has its roots in the tremendous growth in numbers of secondary school graduates in the past decade. Although many new universities and colleges were established, the number of places currently available is still inadequate compared to the number of applicants for admission. For example, in 1977 some 80,000 secondary school-leavers were expected to compete for about 15,000 places in the universities. Budget and manpower constraints limit the growth of various universities which are forced to stabilize their student enrolment in order to maintain teaching quality and the standard of their graduates. The general public as well as the Government will almost certainly put pressure on the universities to reconsider their enrolment policies. Under the present circumstances, it would be extremely difficult to change the social value given to higher education, and thus the demand for admission will continue to rise as more and more high school graduates are produced with the universalization of education.

To try to maintain high academic standards with the constraints and growing demands for higher education, universities will have to search for programmes to bring about improvement in management, teaching-learning processes, and in staff quality.

There are many types of personnel presently working in Thai universities. They may be grouped under the following categories:

(a) Academic staff responsible for teaching, research and professional services. This group includes professors, associate professors, assistant professors, and instructors.

(b) Academic supporting staff responsible for providing academic services. This group includes librarians, audio-visual staff, medical doctors, nurses, research assistants, laboratory instructors and others as specified by the University Civil Service Commission.

(c) Administrators and other office personnel. This group includes rectors, deputy rectors, deans, deputy deans, directors, heads of departments, secretaries and other office personnel.

Faculty and Staff Development

There are many conceptual models of faculty and staff development. One comprehensive model suggested includes three sub-components, which are as follows:

(a) Instructional development;

(b) Organizational development; and

(c) Personal development.

This above model of faculty development is certainly better than those used previously. During the early 1970s, the term was taken to include such activities as sabbatical leave, faculty orientation, participation in conferences, seminars and workshops, and research assistance. The programmes focused entirely on faculty members.

The present author accepts the above comprehensive model of faculty development which defines faculty development as being "instructional, organizational and personal development", but would like to emphasize the need for "personal development", focussing on faculty members themselves rather than on the course they teach. Attention should be paid to improve their academic qualifications, teaching skills, professional expertise, and competence in research.

Policies and Objective in Higher Education and Development

The policy for higher education development in the third National Development Plan (1972-1976) was to aim at the production of high-level manpower to meet the social and economic needs of the country as a whole with emphasis on the accelerated production of quality graduates. Difficulties were experienced which included problems such as shortage of academic and supporting staff, insufficient equipment and laboratory facilities, financial constraints, and administrative procedures. In spite of these difficulties, three new government institutions of higher learning were established. Further, supervision of the ten private colleges was transferred to the Office of the University Affairs. The student population in the thirteen state universities and institutes and the ten private colleges increased to 171,178 compared to 56,116 at the beginning of the Development Plan. The number of academic staff increased from 6,907 to 10,238 for government institutions and from 261 to 765 members for private colleges.

To alleviate the problems and improve the efficiency of higher education development, the Fourth National Development Plan (1977-1981) emphasized the following objectives for higher education:

1. "Improvement of educational administration to enable institutions of higher learning to perform more effectively the tasks of manpower education and training, research, community services, promotion of the arts and conservation of the national heritage.

2. "Improvement of the education system to attain higher efficiency, quality and effectiveness in manpower production to meet the needs of society.

3. "Enlargement of the sphere of higher education to comply with the objectives of national development as a whole, bearing in mind the readiness, uniqueness, and potential of each individual institution to meet the needs of society."

V. Agenda for the Future

1. The Problem of Economics Curriculum

Does the curriculum for a Bachelor's degree in economics constitute the terminal course or preparatory course?

While for most of the students at the B.A. level, the studies are "terminal" in charactor, the courses offered are designed as preparatory to further specialization at the master's level. It appears that there is a need to formulate two sets of courses: one for those who will terminate their studies at the B.A. level, and another for those who wish to pursue further studies with a view to specialization in economics. At the moment this distinction does not exist, with the result that highly quantitative courses, needing good grounding in mathematics are offered to B.A. students, which the latter resent as they do not wish to be specialists in economics. For such students only familiarization courses are needed.

2. Problem in Teaching Economics in Thailand

The main body of economic theory has originated in developed countries. These theories are designed to explain the economic phenomena of those countries. Since the economic situation in the developing countries is not the same, it is difficult to use these theories to explain economic behaviour under conditions different from the countries where these theories originated.

Some economic theories are not relevant to a developing country like Thailand. For example, Freidman's Consumption Functions Theory explains income, as consisting of interest, dividends, and bonds. Tobin's Theory of Saving attempts to explain income in terms of investment in bonds and stocks. However, investment which is an important part of both theories, is an alien concept and does not guide economic behaviour of the large masses of the Thai population. Thus, *examples* from the Thai economy can not be used to explain these and similar other theories. They remain as abstract constructs and students find it difficult to recognize their relevance.

Theory is an abstract formulation which attempts to show a relationship between various factors. It is a logical system. Good theory has a universal scope. If economic theory is to be useful for teaching economics in Thailand, it must be interdisciplinary in orientation.

3. The Unemployment Problem

If the labour market is poorly organized, or if employers are unwilling to hire young people, it would take a graduate several months to find suitable work. This would result in the increase in the rate of educated unemployment. The educated people remain unemployed not because they are educated but because they are young, and fresh from the school without any experience.

Indeed we may go further and say that so long as even a perfectly competitive labour market does not respond instantaneously, a sustained expansion of education at an accelerated rate will result in relatively high rates of educated unemployment.

Table 12-13 (given at the end of the paper) depict a situation which seems to be typical for graduates in the social sciences, an alarming rate of unemployment of 37.80%. The worst case of unemployment rate of 51.29% being those from Ramkhamhaeng, the "open-admissions" university. The reasons for Ramkhamhaeng University unemployment are:

1. The government policy to support the open-admission university in response to the social demand for higher education certification.

2. Social Science graduates are in excess supply in the labour market

Table 14 gives the details about the institutions where the economics graduates have been employed. This survey of the graduate employment situation in 1977 reveals the following:

1. Most graduates work with private firms and government agencies.

2. Of those who are working for private firms, most are in financial, monetary, economic or accounting fields.

3. Of those who are working for government agencies most are in financial, agricultural or economic development field.

4. Those who are working for the civil service are either university teachers, or planners or economists attached to such government agencies as the ministries of Finance and Communications.

5. Many of those working for the public enterprises are with the central bank, either in the research or operations divisions.

6. Many of those working for the private sector are either teachers at private colleges or analysts attached to commercial banks.

To conclude, economics teaching has a rather short history in Thailand. Much of the teaching is done at the undergraduate level, though teaching at post-graduate level has also begun. The teaching is patterned after the Western model, and the curriculum is based on textbooks from abroad. Since research on economics of Thailand is still in its formative stage, not much of it enters into curricula. There is also dearth of specialists who can use complicated mathematical and econometric models. There is a need to encourage faculty development programmes, improve economics curricula, and promote research by Thai economists on Thai economy.

TABLE 12

Number of Unemployed Economics Students Graduated in the Academic Year 1977, by Institutions

Institution	Number of graduates in economics filling-in questionaires	Number of unemployed graduates in economics	Per Cent	Number of employed graduates in economics
Chulalongkorn University	71	18	23.35	53
Kasetsart University	228	54	23.60	174
Chiangmai University	80	41	51.25	39
Thammasat University	262	56	21.37	206
Ramkhamhaeng University	544	279	51.29	265
Total	1,185	448	37.80	737

TABLE 13

Number of Graduate in Economics Unemployed by Causes of Unemployment Institution (Year 1977)

Institution/Field	Total	Reasons for Unemployment		
		Unable to find a job	Applied for a job	Further studies
Chulalongkorn University	18	6	3	9
Quantitative Economic				
Economic Theory	2	-	1	1
Monetary Economics and Public Information	-	-	-	-
Economics Development	1	-	-	1
International Economics	5	1	-	4
Unknown	1	1	-	-
Kasetsart University	54	25	5	24
Economics	16	6	-	10
Agricultural Economic	11	5	-	6
Accounting	9	3	4	2
Business Administration	11	8	1	2
Co-operative Economic	6	3	-	3
Unknown	1	-	-	1
Chiangmai University	41	27	8	6
Thammasat University	56	27	7	22
Economics	30	14	2	14

Institution/Field	Total	Reasons for Unemployment		
		Unable to find a job	Supplied for a job	Further studies
Economic Theory	-	-	-	-
Econometrics	1	1	-	-
Monetary Economic	14	8	5	1
Public Finance	1	1	-	-
International Economic	7	-	-	7
Economic Development	1	1	-	-
Industrial Economic	-	-	-	-
Economic Statistics	-	-	-	-
Applied Economics	2	2	-	-
Ramkhamhaeng University	279	224	15	40
Financial Economic	79	71	3	5
Monetary Economic	37	27	1	9
Quantitative Economic	13	9	1	3
Economic Theory	7	4	-	3
International Economics	30	22	3	5
Economic Development	15	10	1	4
Industrial Economic	12	9	-	3
Agricultural Economic	75	65	4	6
Economic of Human Resource	1	-	-	1
Unknown	10	7	2	1

TABLE 14

Number of Graduate Students in Economics in 1977 being Employed by Organization Institution

Institution/Field	Total	Types of Organization			
		Government agencies	State Enterprises	International agencies	Private firms
Chulalongkorn University	53	11	6	-	36
Quantitative Economic	4	1	1	-	2
Economic Theory	3	1	-	-	2
Monetary Economics and Public Finance	28	3	5	-	20
Economic Development	13	5	-	-	8
International Economics	5	1	-	-	4
Unknown	-	-	-	-	-
Kasetsart University	174	48	23	-	103
Economics	32	13	6	-	13
Agricultural Economics	40	14	4	-	22
Accounting	55	12	7	-	36
Business Administration	38	8	5	-	25
Co-operative Economics	7	1	-	-	6
Unknown	2	-	1	-	1
Chiangmai University	39	7	5	-	27
Thammasart University	206	35	35	3	133
Economics	90	14	13	-	63
Economics Theory	3	1	1	-	1

Institution/Field	Total	Types of Organization			
		Government agencies	State enterprises	International agencies	Private firms
Econometics	11	2	1	-	8
Monetary Economics	68	10	14	2	42
Public Finance	14	4	1	-	9
International Economics	3	-	-	-	3
Economics Development	4	1	-	-	3
Industrial Economics	1	1	-	-	-
Economic Statistics	2	-	1	-	1
Applied Economics	10	2	4	1	3
Ramkhamhaeng University	265	81	28	-	156
Financial Economics	88	32	6	-	50
Monetary Economics	27	5	4	-	18
Quantitative Economics	17	7	2	-	8
Economic Theory	1	1	-	-	-
International Economics	22	7	1	-	14
Economic Development	18	5	2	-	11
Industrial Economics	23	3	2	-	18
Agricultural Economics	64	19	11	-	34
Economics of Human Resource	-	-	-	-	-
Unknown	5	2	-	-	3
Total	737	182	97	3	455

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EIGHT

PHILIPPINES: *Edita A. Tan*

I. *Some Salient Features of the Philippine Higher Educational System*

Two features distinguish the Philippine higher educational system from other countries -- its very large size relative to its population and stage of development, and the predominance of private internally financed colleges and universities. College enrolment of the relevant age group is about 20 per cent, next only to the United States, Japan, and Israel. There are about 700 private colleges and universities located in the larger minicipalities or towns of the islands. About one-half of these are founded and run by religious organizations, mostly Catholic, while the rest are proprietary, i.e., for profit. A few of the latter have been converted to foundation schools, a euphemism for non-profit though they are still income-producing for the founders. All private schools are dependent on tuition and other fees as their only source of income. There is minimal support to schools from philanthropy, possibly because there is no encouragement from the tax system. Personal charity in the extended family structure of the society is the more common practice. On the other hand, the state does not provide any form of support to private schools. It has instead allowed them great freedom in their decision on enrolment, programme offerings, instructional techniques and budget allocation. The Education Ministry's role is limited to setting very minimal standards of quality for physical facilities and faculty. Bachelor's degree graduates are allowed to teach in college. In fact 75 per cent of college teachers are first degree graduates. College curricula were originally patterned after American programme but were injected with courses legislated by Congress, now the Parliament, such as Spanish, Philippine History and social sciences. The Ministry keeps the record of students and approves of their graduation. Up to mid-70s, schools were free to decide on student fees, since their raises in tuition have to be approved by the Ministry. In 1973, the national college entrance test began to be administered. The cut off score for college admission is usually decided by a board on an *ad hoc* basis. There is no educational plan to speak of and there is a very weak accreditation system so that schools operate quite independently of each other.

This relatively free environment has allowed the schools to behave like regular firms and higher education to be determined by essentially market factors. The State's responsibility has been very much concentrated in elementary schools. The Constitution upholds the universal right to basic education and during the very early stage of the country's development, it committed the government to establish public schools throughout the islands. Within 20 years from independence (1946), the government was able to meet this commitment. Elementary education, consequently, absorbed a very large part of the national budget (35% up to 1970). Trying to provide minimal facilities (classroom and teachers) to the ever increasing pupils so exhausted the Ministry's resources -- that very little was left for higher education and other activities, including research and planning.

The rapid expansion of the elementary level allowed the growth of the next two higher levels -- high school and college. High school education is shared equally by provincial government and private enterprise while college education is largely in private hands (85 per cent of enrolment now).

College education has been taken as the appropriate preparation for most white-collar jobs. Until lately, these were considered as very attractive occupations by a large majority of Filipinos for they offered a definitely superior means of livelihood during the early stages of development.

The response of Filipinos to this opportunity is clearly reflected in the rapid growth of college enrolment. Schools operating under a relatively free educational market environment responded in turn to student demand. Table 1 shows the rate of growth of both enrolment and institutions -- over the postwar period, a rate that is quite unique to this country.

Note that the system was growing rapidly at a time when the country's per capita income was still very low, starting at about $200 in 1950 to $800 presently. The large majority of college students could afford low cost education only. In the absence of external assistance.

The following statement from Ateneo de Manila aptly summarizes the financial problems that private institutions of higher learning force in the Philippines:

> "The most critical problems are low faculty salaries, lack of opportunities for professional advancemnt outside the classroom, inadequate funding of faculty development programs, poor library and research facilities. To a certain extent, these problems are the result of inertia and lack of vision among administrators of private universities. During the

> past two decades, however, the Philippine government has been directly and indirectly instrumental in the development and maintenance of high-caliber faculties in the UPSE and other government-run institutions. Private colleges and universities have had to manage with whatever meager resources they have at their disposal. Although this bias in the allocation of funds and professional opportunities is quite understandable, it is incompatible with any avowed intention to upgrade the quality of tertiary economics education in private educational institutions. Private universities such as the Ateneo have had some success at faculty development, but unless appropriate opportunities are made available to its faculty members, it is unlikely that these promising educators will remain after the expiration of their teaching contracts."

II. Teaching of Economics

Economics is offered as a major field at the undergraduate level in many universities and colleges in the country; it is also offered as a part of the curricula of a large number of bachelors degree programmes like the social sciences, agriculture, business administration, and engineering fields. A number of universities offer economics at the graduate level. The economics taught in the majority of the institutions is more descriptive rather than analytical. The quality of instruction is reflective of the inadequate training of their faculty. The large majority (75%) of undergraduate faculty in Philippine colleges and universities (referred to as schools or institutions) has no graduate degrees. Of those with graduate degrees, only a small percentage obtained the degree in universities of acceptable standard.

The state of economics teaching will be appreciated from an assessment of the faculty, the activities and the facilities of the best schools for if the best suffer from quality problems, the more poorly endowed majority cannot but be worse off. The problem of quality is, however, not unique to economics. It has its roots in the rapid expansion of the educational system.

We surveyed the course offerings, research activities and faculty profile of 10 selected schools in the country. These represent the best universities in the country. The schools are

TABLE 1

Number of Schools by Course Offering in the Provinces and in Metro Manila
1967-68, 1969-71, 1972-73, and 1978-79

Course	1967-68		1969-71		1972-73		1978-79		Per cent of Schools Offering each Field			
	M.M.	Provincial	M.M.	Provincial	M.M.	Provincial	M.M.	Provincial	1967-68	1969-71	1972-73	1978-79
Undergraduate:												
Agriculture	1	1	1	80	1	82	3	90	0.3	11.8	11.9	11.7
Chemistry	14	11	9	25	-	-	14	23	4.4	4.9	-	4.8
Commerce and B.A.	46	159	39	385	44	379	62	314	36.2	56.0	60.8	47.5
Engineering and Technology	12	32	17	143	17	150	26	165	7.8	23.2	24.0	44.1
Food, Nutrition and Dietetics	-	-	8	57	8	57	14	75	-	9.2	9.4	11.2
Law and Foreign Service	13	50	14	59	14	60	14	48	11.1	10.6	10.6	7.8
Music and Fine Arts	-	-	15	44	15	44	19	36	-	8.6	8.5	6.9
Liberal Arts and Sciences	52	226	41	439	41	408	59	342	49.1	69.9	64.6	50.6
Medical Sciences	2	12	28	68	28	69	48	138	2.5	14.0	14.0	23.5
Nautical Sciences	-	-	3	6	-	-	6	21	-	1.3	-	3.4
Teacher Training	47	231	33	379	34	383	52	381	49.1	58.5	61.4	54.7
Biological Sciences	3	3	-	-	-	-	-	-	1.1	-	21.7	-
Physics	5	2	-	-	-	-	-	-	-	-	-	-
Graduate:												
Masteral	-	-	30	130	30	121	45	136	1.2	23.2	2.6	22.8
Doctoral	-	-	9	9	9	9	13	24	-	2.6	-	4.7
No. of Schools in the Philippines	117	. 449	67	620	67	628	134	658				

Note: Majority of medical sciences offered was nursing: 14 in 1967-68. Only 5 schools offered optometry, 6 dentistry, and 4 medicine. Thirteen offered pharmacy. Most engineering schools had civil engineering, 27 mechanical, 24 electrical, and 22 chemical. The figures given in the table are from the field within each category which had the largest number of schools offering it, say, nursing and civil engineering for medical sciences and engineering.

Sources: 1967-68 DEC, List of Authorized Private Schools and Courses; 1969, 1971, FAPE Education Book, Vol. V, Intellectual Disciplines, Makati, 1976, 1972-73 DEC, Bu. of Private, Public, and Vocational Ed. Stat. bulls and school reports., Phil. Assoc. of State Universities and Colleges, FAPE, Atlas questionnaire: 1978-79 Directory of Schools by School Offering by Region, 1978-79, MEC.

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located in key cities in several regions -- Manila and Cebu, the two largest and most modern cities of the country, two cities of Mindanao, the largest city of Southern Luzon and the next largest and second most important U.P. campus in Laguna. The institutions selected for the deeper study are listed below:

			Public/Private
1.	University of the Philippines	Quezon City, Metro Manila	Public
2.	University of the Philippines	Cebu City	Public
3.	University of the Philippines	Los Baños, Laguna	Public
4.	University of Sto. Tomas	Manila	Private, Catholic
5.	De La Salle University	Manila	Private, Catholic
6.	Ateneo de Manila University	Quezon City, Metro Manila	Private, Catholic
7.	Ateneo de Naga	Naga City, Bicao	Private, Catholic
8.	Silliman University	Dumaguete City	Private
9.	San Carlos University	Cebu	Private, Catholic
10.	Xavier University (Jesuit School)	Cagayan de Oro, Mindanao	Private, Catholic

These institutions represent the best of the various school categories that exist in the country. Silliman University is the oldest and most prestigious Protestant school; Ateneo and De La Salle have preserved their lead position among Catholic institutions; the University of Santo Tomas, the oldest university in the country was founded under the Spanish rule in 1611. It belongs to the large scale private university group, together with the University of the East and the Far Eastern University. The University of the Philippines' main campus is the recognized top university in a number of fields and it is the recognized economics graduate and research centre of the country. It has acquired a fairly good international reputation. The U.P. Los Banos campus was established in 1908 as the agricultural branch of U.P. in Manila. It is now an autonomous part of the University of the

Philippines System. Its economics programme, though heavily geared to agriculture-related fields, has undergone rapid changes over the last decade. Xavier in Mindanao and Ateneo de Naga in Southern Luzon are two highly regarded Jesuit provincial universities.

In the survey, we assess the economics programme in terms of the educational background of the faculty, their teaching load, whether or not they undertake research, salary scale, library facilities, and textbooks used.

The data from the survey are summarized in a comparative manner in the first set of tables. This is followed by a brief discussion of the characteristics and problems of individual institutions.

We may judge quality of the instructional facility primarily in terms of the size and the educational background of the faculty. Table 1 gives the faculty size and the distribution -- whether full-time or part-time and by academic preparation in terms of the level of educational attainment and where the training was obtained. The table shows that three institutions may be regarded to have adequate graduate faculty -- the University of the Philippines College of Development Economics in Los Baños (UPLB), and Xavier University. These three universities have a large enough full-time faculty with doctoral degrees from recognized universities in the West and here -- UPSE has 20; UPLB, 8; and Xavier, 5. Each has, in addition, a complement of Ph.D. candidates or Master's degree holders to their more senior faculty. Note however that UPLB and Xavier concentrate on agricultural and related development economics majors so that it leaves us with only one strong broadly based graduate economics institution, the U.P. School of Economics. The next best school is Ateneo de Manila. We note though that it plays a very poor second to UPSE in terms of faculty size and academic preparation. The table shows it has only one full-time Ph.D. professor who is a new graduate of UPSE, and four master's degree graduates, three from western universities, and one from UPSE. The faculty of Ateneo seems to be more suited for undergraduate than for graduate teaching. Other institutions compare with UPSE even more poorly than Ateneo. Even De La Salle which is considered of equal standard as Ateneo has a relatively weak faculty, that of economics being comprised of about an equal proportion of masteral and bachelors degree graduates. The survey shows the centrality of the U.P. School of Economics in the economics education setting of the country. This will be shown to be the case for graduate instruction as well as for research.

Another point to note is the inability of the institutions to keep full-time faculty which they attribute to the low salary they could offer. Except for the UPSE and UPLB, most schools rely extensively on part-time teachers. At one extreme, we have the University of Sto. Tomas graduate faculty and the Ateneo de Naga relying on part-time teachers almost totally and at another, the School of Economics which has a minimal part-time staff.

Teaching Load and Research Activity

Teaching load is generally heavy in private schools with most schools assigning about 18 teaching hours per week per teacher. Lower ranked faculty is usually given an additional class of three semestral hours. A teaching load of 18 or 21 hours means 6 or 7 classes since college courses are broken into 3-hour classes. Classes tend to be large so as to reduce cost. A typical full-time teacher would therefore handle at least 180 students assuming a conservative class size of 30. It is not uncommon for faculty members in private schools to take on additional teaching load to augment their income. This fact makes the figures in Table 2 a conservative count of teaching load.

It is obvious that this heavy teaching load of full-time teachers leaves little time for research and professional development. Even teaching is likely to suffer from this heavy load for it leaves little time for student papers and problem sets, and guidance. Part-time lecturers would have even less time for all these activities since they already have their full-time jobs in other offices. It is likely that the time they give to classes is taken from their leisure at night or on weekends. Some may argue that part-time staff are able to enrich their teaching with insights from their experience and their closer exposure to real world situation. This advantage is counterbalanced by their likely weaker dedication to their teaching role and their inaccessibility to students outside the classroom.

Only three economics departments undertake extensive research activity: UPSE, UPLB and Xavier. In general, private universities are unable to support research. The institutions surveyed lament their inability to support research with time off for faculty and funds (Appendix A). Their budget which is almost solely derived from student fees cannot accommodate research. Ateneo and De La Salle, on very few occasions, would obtain research grants. In the last two years, for instance, De La Salle faculty produced two research papers. Ateneo is just beginning to plan a research programme.

Faculty qualification may have much to do with private institutions' inability to encourage research because of budget constraints. Except for Xavier, private schools do not have what may be considered a minimum critical mass of faculty with adequate training for original research. A critical mass of three-to-five research oriented professors would be needed for intellectual interaction and moral support. Both De La Salle and Ateneo have each only one full-time faculty with the doctoral degree. The writer's observation of colleagues in various academic institutions and government agencies shows that Master's degree in economics is an insufficient preparation for independent study. This degree does not require the breadth of reading and the rigour of dissertation writing required in the doctoral programme. Masteral graduates are thus found more suitable for support or associative research role. Private institutions, which are staffed at best by master's degree graduates, are less able to obtain research grants. Their budget constraints disallow them from giving time off for research and faculty development. In a way, they are locked in a vicious circle of financial constraints, weak faculty, heavy teaching load and minimal or zero research activities. They will continue to be in this circle unless a significant amount of external assistance comes to their rescue. UPSE, UPLB and Xavier would have ground in the same circle were it not for the large-scale integrated institutional development support granted to them. A brief history of the growth of UPSE is given in section III in order to highlight the importance of external assistance in institutional development. Also since the School is the economics centre in which the bulk of graduate teaching and research is being undertaken, a detailed description of its faculty, teaching activity and research output is presented.

TABLE 2
Distribution of Faculty by Educational Attainment in the Surveyed Schools

	Full-time Faculty					
	Ph.D.		Masters		Bachelor Degree	
	UP, Ateneo & Foreign Univ.	Other Local Universities	UP, Ateneo & Foreign Univ.	Other Local Universities	UP & Foreign Universities	Total
1. UP School of Econ.	20, 6* a/	-	-	-	-	26
2. UP Los Banos**	8 b/	-	15	-	1	34
3. De La Salle	1	-	1	3	4	7
4. Ateneo de Manila	1	-	4	1*	-	6
5. Univ. of Sto. Tomas	-	1	-	5	8	14
6. UP Cebu	-	-	1, 2*	-	-	3
7. San Carlos 12	-	-	-	3	4	7
8. Silliman	-	-	-	1*	1	2
9. Xavier	5, 1*	-	3, 1*	-	1	11
10. Ateneo de Naga	-	-	-	-	-	-
			Part-time Faculty			
1. UP School of Econ.	5	-	-	-	-	5
2. UP Los Banos**	-	-	-	-	-	-
3. De La Salle	1*	-	2	5	4	12
4. Ateneo de Manila	2	-	9, 3*	-	-	14
5. Univ. of Sto. Tomas	-	15	-	6	5	26
6. UP Cebu	-	-	1	-	-	1
7. San Calos	-	-	-	3	2	5
8. Silliman	-	-	1*, 2	-	2	3
9. Xavier	-	-	2*	-	-	2
10. Ateneo de Naga	-	-	-	5*	-	5

[a] One Ph.D. scholar at the University of Pennsylvania is expected to be back in 1983.

[b] The Departments of Economics and of Agricultural Economics have a total of 14 Ph.Ds in production line, 12 of which are in U.S. and English universities, 2 in UPSE, UPLB would have as large a faculty as UPSE when the scholars complete their doctoral degree.

*Ph.D. or MA candidates.

**Visiting professors/researchers at the International Rice Research Institute usually teach at UPLB Economics Department.

TABLE 3

Programme and Course Offering

	Bachelors Degree	Masters Degree	Ph.D.
1. UP (Diliman)	General programme with varied economics course content	Human Resource Monetary Economics Development Economics International Economics Public Economics Econometrics	Same as M.A.
2. UP Los Banos	B.A., general economics B.A. agricultural economics and management	M.S. in Agricultural Economics Master of Professional Studies in Agric. Marketing Master of Management in Agribusiness M.A. in Agrarian Studies	Ph.D. in Agricultural Economics
3. De La Salle College	General B.A. programme, honours B.A. programme, Liberal Arts-Commerce-Economics (LIACOM)	-	
4. Ateneo de Manila	General B.A. programme Honour B.A. programme	Part-time M.A. programme for working students Major: International Economics Economic Development	-

	Bachelors Degree	Masters Degree	Ph.D.
5. Santo Tomas	General B.A. economics		
6. San Carlos	General B.A. economics	Labour Economics International Trade Economic Development	-
7. Xavier	B.S. Agricultural Econ.	M.S. in Agricultural Economics	-
8. Ateneo de Naga	General B.A.	-	-
	B.S. in Business Economics (Management)	-	
	Liberal Arts-Commerce (LIACOM) with major in Accounting, Economics and Management	-	
9. UP Cebu	No degree programme required by its B.A. but economics courses and M.A. in Business Management		
10. Silliman	No degree programme in Economics, offers only economics courses required for business, accounting, agriculture and agribusiness majors		-

TABLE 4

Full-Time Teaching Load and Salary
(In Hours per Semester Week)

	Load		Monthly Salary
1. UP (Diliman)	9		
2. UP Los Banos			
3. De La Salle: with M.A.	15	Instructor	₱2,030-₱2,697
with B.A.	18	Asst. Professor	₱2,560-₱3,500
		Assoc. Professor	₱3,278-₱4,524
		Full Professor	₱4,234-₱5,549
4. Ateneo de Manila	12		"Slightly higher than UP"
5. Santo Tomas	24	Instructor	₱1,700 for 24 unit load
	21	Professor	₱3,000 for 21 unit load
6. UP Cebu	18		Same scale as UP Main & UPLB
7. San Carlos	21	No response	No response
8. Silliman: 3 preparations	15	Beginning instructor	₱760
2 preparations	18	Part-time	₱40-₱55/unit/mo.
1 preparation	21		
9. Xavier: regular load for B.A. and M.A. graduates	21	Beginning instructor	₱850
Ph.D. and Ph.D. candidates	The load varies from 3-6 depending on administrative and research duties		
10. Ateneo de Naga		No full-time teachers	₱14-₱18/hr
		Full-time	₱850-₱1,068

(The exchange rate at the time of writing this paper was ₱9.70 to US$1.00; however, the present rate is approximately ₱18 to US$1.00)

III. The University of the Philippines School of Economics

The UPSE (referred to as the School) has come to be recognized as the economics centre of the country and one of the best economics institutions in Asia. It is the only broad-based economics department that has been able to acquire and keep an adequate contingent of faculty with advanced degrees from the best universities in the United States and who have committed themselves to academic work. As of now it has 27 full-time faculty in its roster, 17 of which have their Ph.Ds from American universities, 2 from the School. The rest (8) are Ph.D. candidates. It has the highest proportion of faculty with the Ph.D. degree in Philippine universities and even within the University of the Philippines itself. This faculty has been extremely active in all three lines of academic life -- instruction research and related public service (government consultancy, lectures, and the like). The intensity of faculty time use is reflected in the instructional programmes offered, enrolment and research output.

The School offers four instructional programme -- undergraduate, masters, doctoral and a non-degree one-year training programme for middle level government administrators. Enrolment has averaged about a thousand in the past three years consisting of about 700 undergraduates, 30-35 government trainees, and about 120 graduate students. A little less than half graduates each year: all the trainees, half of the undergraduates and a smaller fraction of the graduate students.

Like instruction, research output is also relatively large, averaging more than one paper per faculty per year. The more prolific faculty members produce two or three papers a year. A large proportion of the output has been published in Philippine and Asian journals, some in volumes of international conference papers and a number in prestigious international journals such as the *Quarterly Review of Economic Studies,* the *Economic Journal* and the *Journal of Economic Development and Cultural Change.* The faculty has also been frequently called for consultation by government departments on specific problems -- wage, education, population, public finance. One of the economists became a Minister of Planning, another a Vice-President of the Development Academy of the Philippines -- a training and research institute.

The School has often been cited as an exemplar unit of the University for being so productive. It will therefore be helpful to trace how it came to be and discuss the major factors that were essential to its development and operation. Two factors stand out -- external assistance on a massive scale, and the foresight and dedication of its founding professors. The indispensability of each factor will be appreciated as we briefly give the history of the institution from its extremely modest and rather recent origin. Here we must note that the economics discipline is fairly new to the country. Its first two economists were graduated from the United States in the immediate postwar period; one of them became the second governor of the Central Bank, and another joined a large private university, in addition to his association with a business concern. The next two additions were doctoral graduates from Harvard in 1954, one becoming the director of the economics research department of the Central Bank, and the other, a professor at the University of the Philippines. He (Amado Castro) is the first economics Ph.D. in UP. Together with three other new American university graduates, Castro formed the nucleus, and contributed to the development of the School of Economics at UP.

The School originated as a small undergraduate department of the College of Business Administration. Like other departments of this college, the professors had masteral degrees only until the arrival of Castro (Harvard, 1954) and later on the three other professors: Agustin Kintanar (Yale, 1961), Jose Encarnacion (Princeton, 1960), and Gerardo Sicat (MIT, 1964). Richard Hooley, an American economist married to a Filipina, later joined this group. When General Romulo became president of the University, he launched a fairly large scale faculty development programme for the University as a whole. The presence of these core professors helped strengthen the case for including economics among the disciplines to be supported. A fairly large and integrated programme of support for strengthening "graduate training in economics" was developed with the assistance from the Rockefeller Foundation. It was inaugurated in 1963. It consisted of support for faculty development via scholarship of potential faculty in top schools in the United States, library build-up, scholarship for graduate students enrolled in the School, visiting professorship scheme, and research. The Ford Foundation followed the Rockefeller's lead and provided the School with two successive grants of a quarter million Pesos each in the later half of the 1960s. The grant supported seven doctoral studies in the United States, about the same number as the RF grantees (Table 6). A large part of the Ford grant was utilized for the training programme in development economics (PDE) meant for government officials. A number of visiting professors were employed to develop, administer, and teach in the programme. They also taught in the regular programmes particularly at the graduate level. The support from the two foundations continued until the end of the 1970s. The later grants were for more specific objectives: the

Rockefeller Foundation gave grants for strengthening demographic economics, while the Ford Foundation put in money for promoting expertise in international economics. At the same time, the National Planning Ministry's National Economic Development Agency or NEDA obtained a UNDP grant for strengthening econometrics. The grants were provided for (i) post-doctoral fellowship for studies in the United States, (ii) graduate fellowships in the School, and (iii) for research. As in the 1960s, the later RF and FF school scholarship beneficiaries included students from ASEAN countries, particularly those from Indonesia and Thailand.

Visiting professors were a major complement to the graduate faculty from the 60s to mid-70s. At the beginning, the visitors often-times outnumbered the native professors possessing doctoral degrees. In 1967, for instance, full-time faculty number 16, of which only six Filipinos had Ph.D. degree. Visiting professorships, however, formally ended in 1973. By then, the School began attracting foreign visitors. Some of these spend their sabbatical like a few Australian and Japanese professors, others come principally to undertake a research project. Visitors are requested to teach at least a course for the duration of their visit.

In the initial phase, the instructors with temporary appointments formed a large percentage of the faculty; these were either fresh graduates or Ph.D. candidates. In 1967, for instance, out of the full-time Filipino teachers, 10 were temporary appointees. The School has now fewer temporary instructors. Most of the faculty is well-qualified.

Table 6 brings out the importance of foreign scholarship and the problem of brain drain in faculty development. We find that except for four faculty appointees, all were under scholarship. The faculty development programmes of the Rockefeller and the Ford Foundations supported seven doctoral students each (or a total of 14) in the 1960s. These were chosen from the masteral classes. The RF fellows were sent to any of the best universities in the States while majority of the Ford fellows went to the University of Wisconsin which was then administering the Ford-UP School of Economics programme. It should be noted that out of these 14 grantees, six did not return to the country upon completion of their studies in the U.S., high rate of brain drain, the faculty grew rather slowly and it remained small until late 70s. To remedy this problem, the School activised its recruitment programme. A professor was sent to America in 1974, and again in 1975 to look for Filipino economics students who might be attracted to join the faculty. The recruitment was fairly successful in finding about 10 doctoral economics students in various stages of study. The School was able to recruit six, two of whom had just completed their degrees, and the other four were in the process of completing them. The latter were given financial support to complete their studies on the condition that they would later join UP. However, only three out of the four came back. The faculty has also been enlarged by its own graduates — six are in residence now, and by recruits from other institutions within the country. In total, 38 Ph.Ds and doctoral candidates were given regular faculty appointments; of these, 26 studied under the School faculty development programme, 8 had outside foreign scholarships including the four core professors; only four studied on their own. Of the 38 regular faculty appointees, 27 remain in the faculty roster, two of whom are still on study leave -- one in Hitotsubashi University, Japan, and the other at the University of Pennsylvania.

Now the country has adequate supply of Economics Ph.Ds from which the School can recruit so that it can be more selective in faculty hiring. The condition is a big contrast to a decade back when its only option was to wait for scholars to return from the United States. A large part of the existing supply are products of the School itself. The supply is expected to increase as the School continues to graduate students and as Filipinos decide to study abroad. The supply is not likely to increase fast, however. The School's output has averaged about three a year in the last five years. Ph.Ds from foreign universities who return home number at most two a year. Schorlarship grants from the United States have long dwindled as foundations changed their thrust from educational institution-building toward directly beneficial programmes such as rural social services and agricultural productivity. This slow growth will inhibit the development of other economics instructional and research centre in the country which, as stated in the introduction, require a minimum critical or core quality staff. The growth rate may be accelerated if the School of Economics changes its direction from undergraduate to graduate instruction.

TABLE 5
UPSE Enrolment and Person Awarded Degrees (Bachelor, Master, Ph.D.)
1965-1982

	Enrolment					Number of Persons awarded Degree		
		M.A.		Ph.D.				
	Undergraduate	First Year	Thesis Writer	Third Year	Thesis Writer	Bachelors	M.A.	Ph.D.
1964-65							5	–
1965-66		25	11			36	4	–
1966-67		25	20			61	4	–
1967-68	293	36	22			69	7	–
1968-69	236	21	21			112	15	–
1969-70	142	30	36	8		96	19	–
1970-71	124	38	22	6	6	53	14	–
1971-72	134	29	17	5	3	49	10	–
1972-73	109	40	16	4	8	54	6	–
1973-74	81	37	32	7	6	78	17	–
1974-75	204	37	27	13	7	78	24	2
1975-76	237	49	25	9	12	103	24	1
1976-77	372	54	33	9	5	119	22	4
1977-78	440	55	37	13	10	135	21	4
1978-79	575	39	47	8	10	205	36	4
1979-80	751	36	55	19	11	487	24	1
1980-81	752	36	57	18	11	372	29	2
1981-82	711	84		33		406	37	1

Source: UP School of Economics Annual Report.

TABLE 6

List of Individuals Appointed as Regular Faculty of the UP School of Economics by Source of Doctoral Support and by Present Location

	School Scholarship	Outside Scholarship	Personal	In Residence
1. A. Castro (Harvard, 1954)		x		x
2. J. Encarnacion (Princeton, 1960)		x		x
3. A. Kintanar (Yale, 1961)		x		
G. Sicat (MIT, 1963)		x		
4. A. Lacebal (Berkeley, 1961 candidate)	RF			
5. Suwa-Martin (Harvard, 1962)*	RF			
6. R. Mariano (Stanford, 1964)*	RF			
7. M. Mangahas (Chicago, 1965)*	RF			
8. R. Bautista (Yale, 1966)*	RF			x
9. D. Villanueva (Wisconsin, 1966)*	FF			
10. G. Jurado (Wisconsin, 1966)*	FF			x
11. R. Tidalgo (Wisconsin, 1967)*	FF			x
12. N. Madrid (Wisconsin, 1967)*	FF			
13. R. Alonzo (Chicago, candidate, 1969)*	RF			x
14. C. Miranda (Wayne, 1969)*	FF			x
15. A Fandialan (Michigan, 1969)*	FF			
16. B. Diokno (Syracuse, 1981)	FF			x
17. R. Fabella (Yale, 1982)	RF			x

	School Scholarship	Outside Scholarship	Personal	In Residence
18. F. Medalla (Northwestern, 1983)	RF			x
19. Jim Lim (Pennsylvania, candidate)	RF		x	x
20. R. Danao (Berkeley, 1975)	RF*			x
21. C. Paderanga (Stanford, 1976, 1979)*	RF*			x
22. M. Montes (Stanford, 1976, 1981)*	RF*			x
23. E. Remolona (Stanford, 1982)	RF			x
24. L. Manibog (Berkeley, 1980)	RF			x
25. A. Armas (UP, 1975)	RF-FF			
26. D. Canlas (UP, 1979)	RF-FF			x
27. V. Paqueo (UP, 1977)	RF-FF			x
28. R. Ferrer (UP candidate)	RF-FF			x
29. H. Moreno (UP candidate)	UP			x
30. S. Navarro (UP candidate)	RF-FF			x
31. E. de Dios (UP candidate)	RF-FF			x
32. G. Tecson (Hitotsubashi candidate)		x		x
Recruit after completion of degree				
33. E. Tan (Berkeley, 1967)			x	x
34. E. Pernia (Berkeley, 1976)		x		x
35. A. Herrin (Iowa, 1972)			x	x
36. F. Alburo (Colorado, 1974)		x		x

	School Scholarship	Outside Scholarship	Personal	In Residence
37. S. Monsod (Pennsylvania candidate)			x	x
38. V. Velasco (Indian, 1973)		x		
Total on School Scholarship	27			18
Full-support foreign universities	15			8
1960s	12			5
1970s	3			3
Partial foreign universities	5			4
Full-UP	7			6
Total on outside school scholarship		7		6
Personal	-	-	4	3
	27	7	4	
		38		

*Date when sent to the U.S. The other date refers to completion of degree.

Source: UP School of Economics Annual Report and Catalogue.

TABLE 7

Number of Faculty in the UP School of Economics 1965-1982

	Regular Filipinos					
	In Residence	On Leave	Visiting	Filipinos with Ph.D.	Part-time	Full-time Faculty
1965			n.a.	4	n.a.	16**
1970	20	4	4	8	n.a.	21
1975	22	6	4	9	4	20
1976	29	9	1	10	5	21
1977	32	9	4	13	0	27
1978	33	9	5	15	13	29
1979	32	12	2	16	14	22
1980	33	13	4	16	15	24
1981	30	7	3	18	14	26
1982	27	2	1	19	7	26

*Includes part-time Visiting Professors on appointment in the Agricultural campus and other government agencies. Some may have taught for one semester only, others for two semesters.

**Full-time equivalent.

Source: Philippine Center for Economic Development Annual Report and Class Schedules.

TABLE 8

*UPSE Institute of Economic Development and Research**
Discussion Papers by Filipino and Visiting Professors
1965-1982

	Filipino	Visiting	Total
1965	6	-	6
1966	5	2	7
1967	8	11	19
1968	21	14	35
1969	15	8	23
1970	11	12	23
1971	13	16	29
1972	16	12	28
1973	14	4	18
1974	18	4	22
1975	15	4	19
1976	23	5	28
1977	7	-	7
1978	13	3	16
1979	18	5	23
1980	12	1	13
1981	14	1	15
1982	13	1	14

*Until the late 70s when the School contracted big projects such as the Philippine Resources, Environment and Population in the future (PREPF) and the Economic and Social Impact Analysis/ Women in Development (ESIA/WID), the IEDR discussion papers comprise most of the School-sponsored researches.

IV. Research Activities and Facilities

For a long time the School of Economics was almost the sole producer of research in the country. In the last ten years a few research units or institutes have been established by the government. The more active of these are the Institute of Labour and Manpower Studies (ILMS), the Technical Board for Agricultural Credit (TBAC), and the Philippine Institute for Development Studies (PIDS). The first two are highly specialized in their respective area of interest while PIDS's scope of interest includes crucial Philippine development issues. Though it is the youngest, having been founded in 1977, it has made a significant contribution to research. It is well-funded with government endowment and international research grants which it uses for supporting independent studies and for hiring its own researchers, including visiting professors. At present, it has what may be considered a critical minimum core (numbering five) of bright though young Ph.Ds from which a viable research staff can be built. Their research projects are organized in such a way that co-operation between the staff, visiting scholars, and other local researchers is made possible. In addition to these institutes, some government agencies have research divisions. The more important research units are the Department of Economic Research of the Central Bank and the Economic Research and Planning Division of the Planning Ministry. Their studies tend to be specialized in the areas of direct relevance to the concerns of their respective offices.

The faculty of the School of Economics has been quite prolific. Their output together with their students' Ph.D. and master's theses comprises the bulk of research done in the country. It covers a variety of fields though it is unevenly concentrated in certain areas. The direction of research has been very much determined by the expertise that happened to be present in each period of time, by perceived development issues and problems, and by the availability of financial (and other) support. International and governmental support has played a very important role in determining the areas of study for the remuneration from these sources substantially augments the rather low basic salary of the professors. A brief discussion of the School's research history may be useful for the lessons it may have for other research institutes in the Philippines and elsewhere.

Faculty Constraints

The School was fortunate to have its core faculty of prolific researchers, who inspired others to follow their foot-steps. Jose Encarnacion produced a succession of short theoretical papers that got published in prestigious international journals in the 60s. In 1964, he was joined by a new Ph.D., Gerardo Sicat, another highly prolific professor. The other three regular professors — Castro, Hooley and Kintanar -- were also quite productive. Visiting professors made as much significant contribution in research as in graduate instruction. In Table 8 we find that from 1965-1970 this small faculty produced 113 papers or an average of 18.8 per year. Sicat would sometimes produce four papers a year! They were researching a virgin territory, and therefore any study was a pioneering work.

The Rockefeller Foundation provided the first major research grant to the School and this supported the work of the core professors. The support was probably crucial in developing and stimulating research work. In 1974, the government established the Philippine Center for Economic Development (PCED) granting it an endowment fund that was large enough to support all regular faculty members with a modest research honorarium. This grant seems to have been very important in retaining the faculty for it can be relied upon as a stable supplement to basic salary. As the faculty gained a reputation for its research capabilities, invitations to undertake studies accompanied by financial support poured in a fairly constant and ample rate. Commissioned works given to individual faculty members and to the institution may have stimulated faculty interest even more than its regular research programme. These studies have been undertaken in addition to School-funded research work so that additional compensation can be earned from them. Moreover, they help the researchers establish international contact and open for them opportunities for participation in conferences. Studies were also done for various government agencies; some were part of consultancy service. Work for the government brings with it a sense of public service as well as local recognition. As a whole, research is a very rewarding experience.

Here we must take note of the fads and fashions in research interests of international and foreign funding agencies. The economics academic centre of the developing countries, with Western-trained staff, like the Philippines, are likely to be more readily taken in by fads currently prevalent in the West with total disregard to national needs and priorities. These tendencies are somewhat reflected in the UPSE research. Interest passed on from one field to another in a more or less chronologic fashion: growth, international trade and agriculture; education; population; income distribution; and migration. Of current interests are energy, rural welfare, and women in development. Among the foreign and international organizations that helped support faculty research in specific areas are Rockfeller Foundation and the Population Council on demographic economics, Ford Foundation on International Trade, USAID on women in development, and the International Labour Organization on income distribution.

Faculty output is substantially augmented by graduate student theses at both the doctoral and the masteral levels. Quite frequently graduate students participate in the larger projects of the School or of the individual faculty. Such participation tends to hasten thesis completion. The student involved need not search for a thesis topic; he also gets closer supervision from his advisers who have immediate interest in the quality and the rate of progress of his work. Research grants, therefore, indirectly support the instructional programme at the M.A., and post-graduate levels.

It must, however, be said that international research fads do not necessarily conflict with domestic concerns. Income inequality and high population are definitely serious problems in the Philippines. But so are government inefficiencies in credit management, health problems, and other topics. The danger lies in too much concentration of effort in the fields of contemporary fashion, and neglect of areas of research that are of vital social concern. We may now briefly review the situation in other universities:

Ateneo de Manila University

The Ateneo economics department currently undertakes minimal research activities/consultancies. This is attributed to: (a) the absence of a sufficiently large critical mass of full-time faculty members, and (b) the absence of an institutional framework to promote research and related activities in economics and business.

With reference to the first constraint, the situation is expected to improve further with the anticipated return of some faculty scholars from graduate studies in the United States. As recently as two years ago, there were no more than three senior full-time faculty members servicing the needs of a fairly large undergraduate population. The excessive reliance on part-time lecturers inevitably resulted in a variety of problems.

The establishment of an institutional framework to promote research and related activities in economics and business is under serious consideration now that there is a growing pool of human resources to draw from. At present, individual members of the faculty are permitted to accept research projects/consultancy contracts which they are able to secure through their own efforts. However, the privilege of a reduced teaching load is not generally granted, which may explain why few faculty members take the initiative to engage in professional undertakings outside the classroom.

Library Facilities. There are approximately 5,000 economics titles. Total number of books is 150,000.

As a matter of policy, the Ateneo Library does not hold an extensive collection of economics textbooks. Students enrolled in economics subjects are expected to purchase their own copies of primary reference materials.

The university library's economics collection includes a respectable sample of titles in the following areas of specialization: economic history, labour economics, international economics, econometrics, industrial economics, agrarianism, agricultural economics, monetary economics, transportation economics, economic development, and government finance.

The university's faculty wage scale is slightly higher than that of the University of the Philippines (Diliman). In recent years, some professorial chairs have been established to help bridge the sizeable gap that exists between employment in the academe and employment in government or industry. However, these benefits apply only to a small group of senior faculty members.

The most critical problems are low faculty salaries, lack of opportunities for professional advancement outside the classroom, inadequate funding of faculty development programmes, poor library and research facilities. To a certain extent, these problems are the result of inertia and lack of vision among administrators of private universities. During the past two decades, however, the Philippine government has been directly and indirectly instrumental in the development and maintenance of high-caliber faculties in the UPSE and other government-run institutions. Private colleges and universities have had to manage with whatever meager resources they have at their disposal. Although this bias in the allocation of funds and professional opportunities is quite understandable, it is incompatible with any avowed intention to upgrade the quality of tertiary economics education in private educational institutions. Private universities such as the Ateneo have had some success at faculty development, but unless appropriate opportunities are made available to its faculty members, it is unlikely that these promising educators will remain after the expiration of their teaching contracts.

University of the Philippines at Los Baños

The Department of Economics of the College of Development Economics and Management is relatively young. The Department was created in 1975 when the Institute of Agricultural Development and Administration was formed out of the original Department of Agricultural Economics, College of Agriculture.

Being a young department, its staff members are also young. Some are fresh from their undergraduate studies or masteral studies, hoping to pursue more advanced training. Four staff members are currently in foreign universities hoping to earn their Ph.Ds. Thus far, the current composition of the present staff members may be characterized as "bottom heavy" where a large proportion consists of instructors.

Another feature of the present Department of Economics' is that it does not have its own curricular programme. It is a service department offering courses in support of (1) the general education curriculum; (2) the undergraduate programmes in B.S. Agricultural Economics and B.S. in Agribusiness Management; and (3) the M.S. and Ph.D. programmes in Agricultural Economics. However, the Department has a proposal for an institution of B.A. in Economics and it is now being examined.

Since the Department of Economics is a service department, perhaps it should be looked upon not as a separate entity but a part of a larger faculty involved in offering an undergraduate (B.S.) and post-graduate (M.S. and Ph.d.) in Agricultural Economics.

Problems. One problem of the Department is the relatively rapid turnover of its staff members. While the university was able to attract new graduates from the UP School of Economics, it does not have enough incentives to keep them here. Scholarship funds are scarce, promotions are relatively slow, and there is not much opportunity to supplement income levels through research consultancies unless one has a Ph.D. degree. Thus, staff members are recruited annually to teach the basic courses; this causes for lack of continuity.

Another problem is the lack of research funds which is institutionalized within the College. Most of the research funds in the College are granted to specific individuals, not to the College.

Ateneo de Naga University

The Economics Department of Ateneo de Naga University did not conduct any research project in the past. However, the staff had been, and is presently, involved in the research projects of the Research and Service Center which is the research arm of the Ateneo de Naga University.

The Research and Service Center (RSC), founded in July 1970, is the research and community extension unit of the Ateneo de Naga. It operates directly under the school's office of the President.

Objectives. The RSC is committed to undertake planning, research, and community extension projects for both the School and the Bicol region. It has two major aims: (1) to assist the Ateneo de Naga administration in developing its high school and college department through institutional planning and management, and (2) to make the school resources and facilities the instruments and agents of socio-economic and human development in the Bicol region through the RSC's research and extension projects.

To achieve these objectives, the RSC assumes the following functions: (1) to conduct researches in its own or in co-operation with other agencies on social, economic, religious, and political concerns of the School and the Bicol region; (2) to make available to the public its research findings and to disseminate research results in the form of journal, articles, individual papers, seminars, or symposia; (3) to suggest priorities for research and/or community extension projects to be undertaken by the School; and (4) to make the School curricula more meaningful to students by encouraging and allowing them to participate actively in designing and implementing research and/or extension work.

To augment its permanent three-member staff, RSC hires research associates and assistants on contractual basis. From time to time, it draws research associates from the Ateneo de Naga college faculty to undertake some of its studies.

Research and Extension Activities. During its initial three-year existence, the RSC conducted researches addressed to the planning needs of the Ateneo de Naga, and embarked on a community extension programme involving seminars on co-operatives. In mid-1973, the RSC assisted the Institute of Philippine Culture of the Ateneo de Manila University in establishing a research group to serve the social science research needs of the Bicol River Basin Development Programme Office (BRBDPO). This resulted in the formation of the Social Survey Research Unit (SSRU), based at the Ateneo de Naga, which engaged in the services of the RSC personnel. Consequently, the RSC became indirectly involved in survey researches for the BRBDP from late 1973 to mid-1976. The SSRU was phased out in 1979-80.

Since 1974, the RSC started undertaking contracted researches. A number of the earlier studies were limited to data collection and/or processing while a few involved designing the research, data gathering, analyses, and report writing. As of 31 October, the RSC has completed 13 studies and is currently engaged in two other projects.

At present, the RSC is negotiating to undertake two research projects: (1) Bicol Multipurpose Survey among 100 *barangays* covering farmers and labourers, to be contracted by the BRBDPO and the USAID, (2) case studies through surveys and documentation of selected Barangay Service Point Officer (BSPO) in pilot municipalities of Camarines Sur to be funded by the Provincial Population Co-ordinating Council (PPCC).

Besides research, the RSC has endeavour to meet its commitment to undertake rural community development programme in the Bicol region, particularly with regard to the aspect of involving rural communities in development efforts. In 1981, it has initiated the formation of the Social Integration Office especially staffed to carry out extension work involving teachers and students in community projects. It has endeavoured to start an integrated rural community development programme which is composed of the following tasks:

a. Social immersion among faculty and students in several selected pilot communities in Camarines Sur;

b. Baseline and monitoring studies to accompany the programme;

c. Non-formal extension classes for the pilot communities; and,

d. Co-operative-industries development project.

Sustaining the RSC's dual commitment (i.e., research and extension) has been a continuous struggle, owing to two major reasons: (1) absence of funds to underwrite the initial costs of both research and extension projects, and (2) the limited supply of trained personnel to handle them including the equipment to facilitate implementation. To help build its working capital, the RSC has sought for more commissioned researches and has prepared proposals for funding its rural community development programme.

Xavier University

The department of Economics at this University has a hard time retaining good and qualified teachers due to competition from a nearby state university (MSU) that gives a relatively higher rate of remuneration and better working conditions. Salaries for teachers at Xavier University are quite low, a fresh B.S. graduate gets only something like ₱850/month with a regular teaching load of 21 units. Being a private school, the university does not receive any financial support from the government. Honours graduates of the school are being enticed by Ayala and other big corporations to work for them. In the Institute of Market Analysis, faculty members are more lucky because there are professorial chairs available carrying an honorarium of around

₱2,000 a month for chair holders. Fr. Nicholson, Chairman of the Department of Economics says that funding for research projects is not easily available except for projects that deal with demographic problems.

Needs: (a) Given a qualified university the national government could give this university some funding for teachers' wages/salaries; (b) UP Diliman/Los Baños could provide on request syllabus for the undergraduate and graduate courses to Xavier University, also provide copies of case studies in the business/agribusiness programme; (c) UPSE could provide XU with copies of research outputs and discussion papers; (d) UP and XU could co-operate and conduct research projects especially those involving Northern Mindanao; for this purpose, UP people could team-up with equally qualified researchers from XU.

UP Cebu

There is no problem with regard to availability of economics teachers. There are quite a number of applicants with an M.A. Economics degree or units from San Carlos but hiring of teachers is limited to UP graduates.

University of Sto. Tomas

The time allowed for research depends upon the arrangement between the department and the faculty member concerned. The department is reluctant to permit faculty members to do research work because they have heavy teaching load. Besides, there is really no funding. At present, there is practically no research done in the department except perhaps revision and improvement of textbooks.

The Social Research Center, one of UST's research centers was supposed to be the research arm of the Social Science Department but it was structured differently. The researchers in this office are hired from the outside. Faculty members, however, are allowed to do research work through SRC. Funding comes mostly from Catholic institutions abroad. Thus, research projects are mostly religious-oriented.

The SRC had a recent start. It has not done any economics related project. It offers ₱3,000-₱4,000 monthly salary for 30 hours research work.

UST's problem is mainly financial. It has competent faculty but it has no research funds. There is also a problem of attracting teachers. Thus, faculty members have heavy teaching load.

De La Salle University

The time allowed for research depends upon the department. Research time is negotiable with the department. There are full-time researchers, full-time teachers, and part-time researchers and part-time teachers. For full-time teachers, any research activity conducted is considered on overload.

The Integrated Research Center is the research arm of the university. All university-funded research projects are co-ordinated by this office.

The faculty members of the Economics Department have their own individual (private) research projects, just like UPSE. Like the latter, the department does not interfere with them.

Research honorarium depends upon the rank and the decrease in teaching load for time to be spent for research. For instance, if one is "deloaded" of three units, the honorarium will amount to the salary equivalent of a three unit teaching load. In effect therefore, the faculty member gets the same salary whether he engages in research (with less teaching load) or teaches with a full load.

V. Overview of Situation of Economics in the Philippines

The Philippines, like many developing countries, is highly centralized; the seat of government, the major industries and commercial institutions, and the important universities are all located in the country's national capital city of Manila. "Everything" is in Manila. Most decisions, including detailed provincial appropriations are decided at the head office. Manila has also a large concentration of the nation's population, approximately 15 per cent. The location of the School of Economics in this city immerses its staff into the myriad concerns of the society including those which are non-economic in nature. In many cases, this exposure helps direct the orientation of the faculty towards policy issues, possibly even shape the members' views. At the same time they have been directly involved in the issues of the time via invitations to public lectures, research, and consultancies. The studies on income distribution and poverty, financial repression and industrialization policy were, to some extent, a response to perceived problems. Our inventory, in fact, shows that the great majority of the output is policy- or problem--oriented. The palpability of the issues has, in fact, detracted interest from the less immediately useful areas. It would seem that the researchers' exposure and sensitivity to social issues and the cost-benefit calculation of issue-related studies mentioned earlier have swung the allocation of research effort too far away from the more elusively useful field. In fact, too few works have been done in theory and none in the area of economic history.

Research Output

We made a rough inventory of research output by listing and counting titles of work done in the country by both Filipinos and visiting professors. Excluded are the studies done outside the country. Fortunately, a series of surveys of Philippine development literature was recently completed with support from the PIDS. The surveys covered six fields -- spatial economics (including migration); income distribution and poverty; monetary economics; macro-economic models; demography; public finance; and labour and employment. The surveys on the first four topics appeared in 1980; the other three, last year. They provide a major source of research done in these fields including those written outside the UP School of Economics. We began the inventory with a list of all the economic studies found in the bibliography of the survey papers and added to it all other works done in the School of Economics and at the Centre for Research and Communication. The inventory is not exhaustive since this writer did not attempt to search for unpublished studies in government agencies. However, nearly 90 per cent of all research publications have been covered in the bibliography. The literature on agricultural economics, which is a fairly large one, is not include in this survey.

Table 9 gives a simple count of the studies we listed from the above sources. They are grouped by fields of specialization. The approximate date of the introduction of a new area of research is also indicated.

A few things are to be noted. First, there is an unevenness in the level of activity among the fields. Secondly, different areas of research interest developed at different time. Studies on growth and industrialization had the earliest start in the early 1960s, demography in the late 1970s, income distribution and poverty in the mid-1970s, and spatial economics at the turn of the 1980s. The more traditional fields like public finance and monetary economics are starting to receive greater attention which remained by far somewhat neglected. Studies in international trade are almost wholly done by only one scholar (Bautista) for now more than a decade. There is almost no work on economic history. The last historical research done by a Filipino was Legarda's Ph.D. dissertation in 1954. The investigator could not find any later works. Another important area which has escaped notice is "industrial organization". There is, however, interest in the current popular issue of multinational companies and two papers are listed in this field. No one has carried out any significant theoretical research, save Professor Encarnacion. About 80 per cent of the inventoried studies was undertaken by the staff of graduate students and other affiliated researchers, of the UP School of Economics. This is not surprising given the scarcity of well-trained economists (and given the absence of research support and facilities) in other academic institutions and research units.

TABLE 9

Economic Studies Undertaken in the Philippines Postwar

	Number	Date
Income Distribution & Poverty	40	Mid-70s
Economic Development & Industrialization	68	Scattered over 1960s present
International Trade	45	70s-present especially late 70s to present
Monetary Economics	78	Scattered over the 60s to present
Public Finance	23	Scattered over the 60s-70s
Human Resources & Labour Economics	81	70s
Spatial & Regional Economics	27	Late 70s
Demographic Economics	45	Mostly (39/45) in late 70s-present
Energy & Other Natural Resource Economics	8	Late 70s
Macro-models	12	10 in early 70s; 2 in late 70s
Agriculture (done by UPSE faculty)	36	Early 70s
Project Evaluation (USAID projects mostly)	19	1981-1982
Theory	20	Scattered
Econometrics	14	75% in early 70s; 25% in late 70s
Miscellaneous (Political Economy, etc.)	13	70s

1. The Center for Research and Communications (CRC) has its own in-house biennial journal, *Economics and Society*, in which papers, mostly on industry, written by CRC staff are published.

2. There is tremendous work in agricultural economics undertaken at UP Los Baños, by the Technical Board on Agricultural Credit (TBAC) are not inventoried as they form a large literature.

TABLE 10

UPSE Faculty Research Output
1975-1982

	IEDR DP	Other Papers	Publications Appearing	DP and Other Papers Faculty	Publication/ Faculty*
1975	19	NR	11	-	.55
1976	19	20	30	1.86	1.43
1977	9	29	11	1.03	.41
1978	17	33	20	1.72	.69
1979	23	27	19	2.27	.86
1980	13	45	20	2.42	.83
1981	15	41	31	2.11	1.19

*Full-time faculty including Visiting Professors.

NR = not reported.

IEDR-UPSE Institute of Economic and Development Research.

DP = Discussion paper.

Source: Philippine Center for Economic Development Annual Report and class schedules.

Research output has been just as unequal among the faculty of the School as across areas of specialization. A number of professors have been very prolific researchers. Bautista's work predominates in trade, Mangahas in income distribution, Pernia and Herrin in demography and migration, and to a lesser extent, Tan in monetary economics and economics of education. The new Ph.Ds in the faculty are more research oriented; they are expected to contribute to future research in the areas of public finance and monetary economics.

Prospects and Problems

Tremendous progress has been achieved in the development of the discipline of economics in this country over the last 20 years. In 1960 there was no economics graduate and research institution. There were only six economists with doctoral degrees from internationally recognized schools and only three of whom were in the teaching profession and that too only at the University of the Philippines (U.P.). There are now close to 40 Ph.Ds in the country in addition to the agricultural economists in Los Baños and Xavier universities. Over these years, the small undergraduate economics department of U.P. has gradually grown into a full-fledged centre. It now boasts of 27 regular staff of well-trained and very active economists. Nineteen of them have doctoral degrees, the rest are close to completing it. This faculty teaches about 120 M.A. and Ph.D. and 700 undergraduate students, and 35 government officials. It produces about 50 papers per year or an average of 2.1 per faculty member (1978-81). The School is housed in a three-building complex. It has a good reference library and it is endowed with a fund for research and other activities. Funds for research from other sources are regularly received augmenting the earnings from the endowment. Visiting professors from other countries, coming on their own, also expand its instructional capacity. The establishment of the M.A. programme of the School has allowed the development of other research units like the Technical Staff for Agricultural Credit (TBAC) and the Philippine Institute for Development Studies (PIDS) -- a very active government research institution in the country. Both are headed and staffed by the products of UP. The School's graduates have also strengthened government offices like the Planning Ministry though its best graduates have been recruited into the faculty. It is expected that the supply of economists from UP School will continue to rise. It is doubtful, however, that other academic institutions would benefit from it. They have been unable to attract the School's graduates. In fact, only two doctoral graduates decided to join the faculty of these institutions, one in Ateneo, and another in Xavier. Xavier has been unable to retain its only Ph.D.

Private schools are almost totally dependent on tuition for their revenue which has been quite low. It currently ranges from equivalent in Peso of US$100 to US$500 per year only, a level that simply cannot pay for attractive faculty salary, time off for research, faculty development, and library facilities. Even the two best-regarded and most costly private universities, Ateneo and De La Salle, are unable to attract well-trained economics faculty. Economics graduates are instead found in large financial houses and well-paying government agencies. For this reason, the economics faculty and facilities in private schools are inadequate. Unless these institutions find external sources of funding, they will be unable to develop their economics programme. These institutions suffer from very serious financial constraints. The significance of these constraints in faculty development is clearly shown by the experience of the School of Economics at UP. We recounted its experience in which a fairly massive and well-planned programme of external assistance played an indispensable role in its development. We must note here that the Rockefeller and the Ford Foundations' support for strengthening its graduates was not only large but long-run, lasting from 1963 to 1980. It consisted of foreign scholarship of potential faculty, visiting professors to complement the as yet small faculty, and local scholarship to attract students to the programme. As Ford and Rockefeller gradually phased out in the late 1970s, the Philippine Government support came in. Moreover, the School may expect continued involvement of its faculty in supported external collaboration, consultancies, and research grants. This has made academic life appear richer.

The School has many pluses going for it especially when compared to other economics departments. But it is not without problems. As stated earlier, the University's basic salary is quite low ranging from $150 to $400 per month. Large corporate executives get five times or more. With the double digit inflation in the last 12 years, the salary in real terms, has fallen drastically. The School's endowment does not adequately augment faculty pay. Majority of the faculty has thus been pressurised to accept research contracts and consultancies from other agencies for monetary reasons. The importance of this financial source is reflected in the number of other papers completed by the faculty. These are usually the papers supported from outside the School fund. In 1981 and 1982, there were more such papers than those written for the School or the IEDR. The more prolific and disciplined faculty sometimes produces two or three papers a year. These extra research and consultancies are done on top of a heavy teaching load of nine classroom hours per week and other instructional chores like thesis advising. Note that on average only 20 to 25 faculty members handle the four programmes -- Ph.D., Master's, training in development economics, and undergraduate teaching. Total enrolment averaged about 750 in the last five years. Added to its own students are the several thousands who take economics courses.

The faculty has an extraordinarily heavy work-load which has probably taken a toll on the quality of its research and teaching. In fact the 1973 Lewis Report on the School and the annual reports of the first dean of the School warned about this problem. The work-load may be eased up by restructuring classes or cutting down on undergraduate enrolment. Undergraduate classes have absorbed more than half of faculty teaching time. This scarce resource may be more efficiently allocated to the graduate programme aimed at increasing its output. A larger supply of M.A. and Ph.D. graduates is likely to have some spill-over effect on private schools. The faculty will, however, be expected to take on additional outside work so long as the salary remains low so that this step may simply be able to improve the School's resource allocation.

The prospects for private universities do not look too bright. Recently, there were some discussions about possible state support for private universities. The idea has not as yet reached the planning stage and it is not likely to be seriously considered by policy makers given the slack condition of the economy and the budget strictures they have adopted. The idea is, moreover, a very novel one for this country; the state has by tradition left private schools to their own devices. The state's role in private education has been mainly supervisory over minimum standard, curriculum and graduate record keeping. The national government's support for higher education is solely in the form of maintaining state universities and colleges, and the elementary schools. Local governments, in turn, operate the public high schools. With an already large state school system it is maintaining, it is unlikely that the government will find it politically desirable to assist private schools. Moreover, the budget for education which used to be the largest part of the national budget for a long time (30-35% up to 1970) has declined to a less than 15 per cent. We may expect, therefore, little change in the conditions of these institutions.

Implications of Theoretical Research Gap

The dearth of theoretical studies in the Philippines poses a serious problem in the economic thinking in the country as well as in other countries of the region. The theoretical basis of practically all empirical and policy analyses done in the country has its origin in the most economically advanced Western societies, particularly the United States. Necessarily the economic, social, political, and cultural environment of these societies has strongly influenced their researchers' view of economic phenomena and behaviour as well as their concerns thus determining the orientation and substance of theory. Neoclassical models which predominate Western economic thinking reflect the ideals in which the capitalistic system would work. Such models which assume competition or efficient market conditions and a very special kind of rationality among economic decision units (utility maximization) explain little of economies of the developing countries. Economic decisions, at the government and individual level, must be understood in the context of structure of power, values, wealth, and income distribution, low income levels or poverty and fragmentation of markets due to underdeveloped infrastructures. These make information imperfect and unequally distributed and give unequal access to credit, education, health, etc. Decisions on consumption, saving, portfolio of assets, work hours, innovation, schooling, etc., cannot be analyzed out of this environmental context. Some of the environmental factors work as constraints on decisions, some may very well determine the realizable objectives and, therefore, the formation of objective functions of decisions. It is possible that varied indicators of satisfying behaviour are applied to decisions depending on the conditions prevailing for the economic unit. Despite the tremendous work in fertility economics, for instance, experts conclude that they have not really understood household fertility behaviour. The same applies to financial investment or consumption behaviour. In the Philippines, Encarnacion has developed the lexicographic objective function which is more realistic for economies with very poor households.

The power structure and the system of government which decide on a large part of national resources has not been seriously studied. The objective functions of governments differ, since the constituencies which support the regimes differ. A democratically elected regime will have to cater to the demands and needs of a larger population base while an authoritarian one needs only to cultivate a narrower base, not uncommonly, the military and the oligarchy.

These and other fundamental aspects of economic development have received little theoretical and even descriptive attention in the economic literature. We may expect that economists in western democracies are less likely to address to these problems than economists from the Third World since the problems are not of as serious proportion in the former's cultures as in the latter. The Third World conditions are likely to complicate the theory, however, and may discourage work in the area. This should not be. It seems that the more serious obstacle to theoretical work is the shortage of economists in developing countries in general, and of economic theorists, in particular.

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NINE

REPUBLIC OF KOREA: *Han Seung Soo*

I. Brief History of the Economic Profession in the Republic of Korea

The history of modern, Western style economics in the Republic of Korea* has to be viewed in the context of the recent developments of Korean history. Since the opening of Korea to foreign powers with the initiation of the Treaty of Friendship and Commerce with Japan in 1876, and then successively with the United States in 1882, with Great Britain and Germany in 1883, and other countries, it could be said that the infrastructure for the introduction of modern economic theory was prepared. However, the Yi dynasty was hopelessly on the decline and was overthrown by the Japanese imperialists in 1910. The country was decolonized after World War II but was divided soon thereafter. Because of political turmoil that followed the division of Korea and the Korean War in 1950, the development of economics as a discipline had to wait until the end of the Korean War in 1953. It can be safely stated that economics as a discipline started to develop in earnest through contact with the Western academic during the early 1950s.

1. The Economics Profession Before the Liberation; From the 19th Century to 1945

The initial introduction of economics into Korea had taken the form of enlightening the people. For example, there had been an upsurge of many economics monographs together with about 160 articles and translations of foreign articles during the period between 1907 and 1908. 1/ Although the quality and the professional standard of these monographs and articles were not very high, they served their major purpose of enlightening the Korean regarding the economic problems of the day. The sudden proliferation of economics writings was an indication of the fact that there was a growing interest in new Western economics in Korea.

The main reason why economics had become widely propagated during this period was due to the fact that several modern-type higher institutes of learning had been established during this period, for example, Yonhee, Korea and Ewha Women's Colleges, 2/ and that Korean students who went abroad to study began returning and writing textbooks and articles in addition to their academic activities. The most active year during the period was 1907, the bench mark year of this new movement. The impending danger of Korea being colonized created the realization amongst the Korean intellectuals that they had to study economics and to try to make the country economically strong by solving the economic problems of the backward Korea of that time.

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* **Korea and Korean in this paper refer to the Republic of Korea.**

However, the growth of the economics as a professional discipline in Korea came to an abrupt end when Japan occupied the country in 1910. Unfortunately, the contents of the early textbooks are not known to us.

It was during the 1920s and 1930s that economics and commerce were again taught and some sort of research activities could be observed at Yonhee and Korea Colleges (both private colleges), Kyungsung Commercial High School and Kyungsung Imperial University (both public colleges). In 1928, the Institute of Korean Economy composed of Japanese professors, became active in conducting research, and produced a series of studies on the Korean economy. *The Study of Korean Economy* was published for the years 1928, 1933 and 1938 but was mainly concerned with empirical aspects of economics and no theoretical contributions were made by the researchers in that Institute.

During the Japanese occupation Korean economists were much concerned with agricultural economics and economic history. In the field of economic history the Marxian interpretation of history dominated the teaching and research activities of scholars at colleges and universities. Even in theoretical economics, most of the contributions were in the form of Marxian economic theory. The main reason why there was a great interest in the Marxian theory of economics was the fact that nationalists used Marxism as a pretext for propagating their cause of decolonization and, more importantly, that Korean economists at that time were taught in Korea or in Japan by Japanese economists who were predominantly influenced by the Marxian theory themselves.

Of course, there were some Japanese economists, though a minority, who went to Europe and the United States in the early part of 20th century and studied orthodox economics. To them, the most important contributions to economics were made by such economists as Cournot, Jevons, Walras, Marshall and Keynes. Some of their books and articles were even translated in Japan, which eventually formed the foundation for the post-World War II upsurge in the interest in modern economics in Japan. However, it appears that no major Korean economist had done any study or research along this line, and this, in due course, had ramifications on the Korean economics profession.

2. The Economics Profession During the Period Between 1945 and 1959

The history of economic science in Korea during the period between the liberation and the Korean war can be characterized by confusion, conflict, and reconstruction. Although the external conditions and political infrastructure changed dramatically, the mainstream economics in Korea was still mixed up with ideology and the foundation of economics as a science had to wait for some time.

Despite this trend in economics, the joy from liberation in 1945 and the enthusiasm that followed caused many economists to indulge in scholastic activities. During this period, 64 monographs, 58 translations and 419 articles were written or translated. These publications were mainly concerned with introductory economics, translations of socialist economic thought or the history of economic thought. The articles were mostly concerned with Korea's development policies and agricultural problems.

During this period most of the economics professors were serving at Kyungsung University, Yonhee and Korea Universities. These were Marxian economists. Those who taught Western-style modern economics were in the minority. This was the natural consequence of the training which these economists had received from the universities in Korea or Japan during the colonial days. 3/

3. The Economics Profession During the 1950s

The Korean War in 1950 brought a drastic transformation of the economics profession in Korea. Many economists were kidnapped by the other side during the war, and some Marxist economists went to the North on their own. The economics faculties at universities and colleges had to be completely overhauled. It can be said that, since the 1950s a new trend appeared in the Korean economics, which started to absorb the elements of modern economics. A new opportunity for the development of economic theory had risen in Korea.

Soon after the Korean war, Professors Shin Taehwan, Ko Seungje, Choi Munhwan, Lee Sangku, Yu Chisoon and Kim Joonkon were leading economics professors at Seoul National University, while Cho Keejun, Cho Dongpil and Sung Changhwan taught at Korea University, Kim Sangkyu and Kim Chuksoo at Yonhee University and Choi Hojin at Chungang University. Together they started to reconstruct the economics profession in Korea and devoted their energy in trying to eliminate the ideological and political elements in economic theory and to rehabilitate economics as a science.

It was in 1952 that they founded the Korean Economic Association in Pusan, then the temporary capital of the nation. Subsequently they published *Kyunjehak Yonku* (Korean Economic

Review) in 1953, the first economics periodical in Korea. In that issue were several interesting contributions. Shin Taehwan contributed "The concept of monetary equilibrium", Choi Munhwan: "Fichte's Theory of State", Ko Seungje: "Introduction to the History of Mining in Korea", Yu Chinsoon: "Analysis of Inflation in Korea", Cho Keejun" "The Task of Modern Economic History", in addition to book reviews by Lee Sangku and Kim Doohi. Thus, the content of the journal was important in that these articles were totally different in nature and approach from those articles that were mostly published in the Korean economic circles before the Korean war. 4/

It can be stated that their important contribution was elimination of the pre-1950 tradition of Marxian economics and opening of a new chapter in the history of economic science. The achievement of the economics profession in Korea during the 1950s were 156 volumes of economics monographs, 144 volumes of translated foreign monographs, and 230 professional articles. The monographs were mainly introductory textbooks on the principles of economics but there were other sorts of books on growth and development, money and public finance.

About two thirds of the translations were textbooks used in foreign countries and histories of economic thought, which reflected the tendency to replace Marxian economics with orthodox economics, and Keynesian economics. Most of the journal articles were concerned with general economics, particularly with economic history. The need and urgency for the introduction and importation of foreign economic theories left no room for the development of indigenous economics.

An interesting phenomenon that appeared in the professional articles at this time was that most of them were concerned with the analysis of the economic problems of the day especially concentrating on the problems of inflation and there were only 4 articles that dealt with the theory of economic growth and the development policy. This was the time when Korea was receiving massive foreign aid, particularly from the United States, and trying to reconstruct the national economy. Yet no theoretical contribution had been made towards solving the long-term problem of the Korean economy, which in short reflected rather well the underdeveloped state of the economics and economics profession in Korea.

In actual fact the 1950s was the period when the translation of foreign ideas was the paramount concern of the economists in Korea. During the period between the late 1950s and the early 1960s, many general textbooks were translated. These included Economics by P.A. Samuelson and books by A. Hansen, A.C. Pigou, J.R. Hicks, O. Lange, J. Robinson, R. Harris, Stonier and Hague,

K. Boulding, and L. Klein. J.M. Keynes' *General Theory* and Adam Smith's *The Wealth of Nations* were also translated. In the field of economic history, the non-Marxian books such as by Max Weber, W. Ashley, A. Toynbee, G.D.H. Cole and W. Rostow; in the field of economic thought and system, books by J. Schumpeter, M. Dobb and F.A. von Hayek; in the area of economic growth and development, R. Nurkse, W.A. Lewis, J. Tinbergen, R. Harrod, E.C. Domar, N. Kaldor, J.E. Meade, and G. Myrdal; in the field of economic fluctuations, the publications by A. Hansen, J.S. Duesenberry and Harberler; and in the field of monetary economics those by J.M. Keynes, A.C. Pigou and D. Robertson were translated. These translations had certainly helped in broadening the academic horizon of Korean economics and a new breed of economics professionals was created. There is no doubt that the translation and introduction of foreign books and ideas greatly contributed to the furtherance of economics in Korea; through this process the basis for Keynesian economics in Korea was gradually created. 5/

4. Economics Profession in the 1960s and 1970s

Since the early 1960s economics in Korea has completely changed. It transformed from the discussion of economic ideologies into a rigorous scientific discipline with a quantitative methodology. Economists began to analyze economic phenomena in more depth and prescribe ways to improve the management of national economy. There are many reasons for the enhancement of economics as a respectable science in Korea.

Firstly, the new economic theory introduced through the translated version of textbooks and others began to have some impact on the younger generation of economics students, whose training became comparable to their foreign counterparts.

Secondly, apart from the new textbooks, the universities started to reform the economics curricula to accommodate the changing conditions. For example, the courses on mathematics for economists and econometrics were introduced for the first time by the Department of Economics of the College of Commerce at the Seoul National University in the late 1950s. This was soon followed by other university economics faculties.

Thirdly, although it was a slow process, the recognition of the value of economics as a practical science began to emerge. This trend had become very much intensified after the successful implementation of the First Five Year Economic Development Plan (1962-1966). Economics is being regarded as a practical science that could contribute much to the development of the national economy.

Fourthly, the recognition of economics as a practical science made the role of economists different. The economics profession in general was not only concerned with teaching and research but also got increasingly interested in problem-solving, and sometimes actively participating in policy formulation and implementation. The social demand for economists continued to increase. Thus, during the 1960s many economists began to actively involve themselves in development planning by giving economic advice on monetary reform, agricultural policy and other matters. Some economists even joined the government as officials of economic ministries and many more served as members of Professorial Evaluatory Groups in the Office of the Prime Minister.

Fifthly, another important event in the history of the economics profession in Korea was the establishment of the Economic Research Institute at Seoul National University in 1961. This was the first economic research institute attached to any univeristy in Korea. The Institute began to publish the *Korean Economic Journal* (now a quarterly) and was instrumental in encouraging research activities at the Seoul National University and elsewhere.

Lastly, the important factor that should not be ignored is the return of those who went abroad to pursue advanced courses in economics. Most of the economics professors until the 1950s were those educated in the national universities or private colleges either in Japan or Korea and there were very few economists trained in Western countries. Their contribution was very insignificant, at least in the academic circles. However, since the late 1960s Korean economists began to come back with Ph.D.s and some economists had even had some teaching experience in the West, mostly in the United States. This trend helped narrow the gap between the economics profession in Korea and the rest of the world.

Together with the development of economics as a science in Korea, the sustained high growth of the Korean economy added prestige to the economics profession in Korea and many talented students began to regard it as a potential future career.

It is significant to note that during the 1960s and 1970s the number of published articles doubled every five years until 1975 and that whilst the number of translation declined the authored books were on the increase. This rapid increase in the number of professional articles reflected the normalization of economic research in Korea. The share of the general economics field began to decline in the total number of professional articles and so did the field of economic growth and development, money and public finance, labour and population. On the other hand, the share of international economics increased dramatically.

The fact that the subject matter of international economics had become very popular during the 1970s seemed to reflect rather well the increasing trend of economic openness of the Korean economy. In the international economics field, much more interest was given to the field of actual trade and foreign capital rather than to the theory of international trade. The fact that there was a relative decline of research interest in the problems of domestic finance enforced the impression that development stimuli came from the international market and finance, from foreign savings, and less from the domestic savings.

This trend was also shown in the publication of monographs and other books. During the 1970s, it was estimated that a total of 347 articles were published by Korean economists in foreign professional journals outside Korea. This was a good indication that the Korean economics profession was increasingly interacting with the economists of other countries.

II. Infrastructure for Teaching and Research in Economics

1. Faculty Organization and Administration

Economics is taught at the Department of Economics and, to a certain extent, at the Department of Trade in Korea. It is also taught at various other departments and colleges such as the department of law, of business administration, of public administration, and of environmental studies, which sometimes have their own faculty members teaching some economics. However, the Department of Economics mostly provides teaching services for them.

The organization of economics faculty in Korea is rather unique in that there are two departments where economics is usually taught. One is the Department of Economics proper and the other is the Department of Trade. The Department of Trade was attached to the institutes of higher learning especially during the late 1960s and 1970s when the export oriented model of economic growth was reaping some fruit, in Korea. However, the role of the Department of Trade differs from university to university. For example, in Seoul National University the Department of Trade is composed only of economists while in many other universities that department is composed mainly of trade practitioners.

In actual fact, the Department of Trade in Seoul National University can be called the Department of International Economics as the Department of Economics does not recruit any international economics specialists.

The departments of economics in Korea belong to one of the following three types of colleges. The most popular form is the attachment of the department of economics to the College of Management and Economics. Another form is to put the department of economics in the College of Politics and Economics. The third, new form is where the department of economics belongs to the College of Social Sciences. The last is the recent development firstly experimented at Seoul National University and later followed by some other universities.

In the case of Seoul National University the Departments of Economics and of Trade were a part of the College of Commerce until 1975. During the process of implementing a comprehensive academic plan for the University, a new College of Social Sciences was created. The College of Social Sciences is composed of 10 departments; eight departments (Politics, International Relations, Sociology, Anthropology, Psychology, Social Welfare, Geography, and Communications) were drawn from the now defunct College of Liberal Arts and Sciences and two departments (Economics, and Trade) were moved from the College of Commerce, which is now renamed the College of Management.

Although there may be some minor differences between Korean universities, the case of the department of economics at the Seoul National University can still be taken as a typical Department of Economics in Korea. The functioning of the department is therefore given as an example.

The department of economics is headed by a Chairman who is elected by the faculty members every two years. There is no limit to re-election and the person need not necessarily be the senior most in the Department. He is assisted by Assistants and clerks to carry out the administrative functions of the department. The chairman calls a faculty meeting from time to time to discuss the changes in curriculum, to assist in new appointments, to report on the state of student admission, etc. As a number of graduate students in economics is large, the faculty decided to delegate the power to the Chairman to choose one of the faculty members as the director of graduate studies.

In order to facilitate the supervision of graduate students the faculty members are grouped into five categories; public finance, money and banking, industrial organization, theoretical economics, and economic history and thought. Each group has a professor in charge and these five professors plus the Chairman and the director of graduate studies constitute a core committee.

2. Total Number of Full-time Professional Teaching Staff

According to the *Hankuk Hakkyo Myungkam 1982-83* (Dictionary of Schools in Korea 1982-83), there were 478 members of teaching staff working both at the department of economics and the department of trade in Korean universities and colleges in 1981. Of the 478 members of the teaching staff, 364 were employed by *Daihakkyo* (universities) and the rest by *Daihak* (colleges) and *Junmoondaihak* (junior colleges). The following shows the breakdown by universities and colleges of economics professional staff.

University	Dept. of Economics	Dept. of Trade	Combined dept. of Economics and Trade	Total
Kangwon National University	5	3	-	8
Keonkuk University	-	-	14	14
Kyungnam University (Masan, Kyungsang-nam-do Province	8	8	-	16
Kyungbook National University (Taegu, Kyungsangbook-do Province	-	-	8	8
Kyungsang National University (Chinju, Kyungsangnam-do Province	3	1	-	4
Kyunghee University (Seoul)	9	-	-	9
Kyemyung University (Taegu, Kyungsangbook-do Province	-	-	9	9

University	Dept. of Economics	Dept. of Trade	Combined dept. of Economics and Trade	Total
Korea University (Seoul)	-	-	10	10
Kukmin University (Seoul)	-	-	8	8
Dankuk University (Seoul)	13	-	-	13
Taegu University (Taegu, Kyungsangbook-do Province	-	-	4	4
Dangkuk University (Seoul)	-	-	10	10
Dongah University (Pusan, Kyungsangnam-do Province	-	-	10	10
Pusan National University (Pusan)	9	5	-	14
Sogang University (Seoul)	10	-	-	10
Seoul National University (Seoul)	18	10	-	28
Sungkyunkwan University (Seoul)	10	7	-	17

University	Dept. of Economics	Dept. of Trade	Combined dept. of Economics and Trade	Total
Sukmyung Women's University (Seoul)	-	-	5	5
Soongjun University (Seoul)	-	-	11	11
Ahjoo University (Suwan, Kyungki-do Province	2	-	-	2
Yonsei University (Seoul)	12	-	-	12
Yeongnam University (Taegu)	12	6	-	18
Wonkwang University (Iri, Chullanam-do Province	-	-	11	11
Sungshin Women's University (Seoul)	-	-	-	1
Ehwa Women's University (Seoul)	2	-	-	2
Inha University (Inchon)	4	5	-	9
Chunnam National University (Kwangju, Chullanam-do Province	-	-	8	8

University	Dept. of Economics	Dept. of Trade	Combined dept. of Economics and Trade	Total
Chunbook National University (Chunju, Chullabook-do Province	-	-	10	10
Chosun University (Kwangju, Chullanam-do Province	-	-	15	15
Cheju National University (Cheju Islanc)	-	2	-	2
Chungang University (Seoul)	6	4	-	10
Cheongju University (Cheongju, Chungcheongbook-do Province	7	-	-	7
Chungnam National University (Toejon, Chungcheongnam-do Province	-	-	10	10
Chungbook National University (Cheongju, Chungcheongbook-do Province	-	-	7	7
Hankuk University of Foreign Studies (Seoul)	5	7	-	12

University	Dept. of Economics	Dept. of Trade	Combined dept. of Edonomics and Trade	Total
Hanyang University (Seoul)	11	5	-	16
Hongik University (Seoul)	-	-	6	6
Hyosung Women's University (Taegu)	-	3	-	3
Total				369

The following are the number of economics teaching staff at four-year colleges in Republic of Korea.

University (Place)	Dept. of Economics	Dept. of Trade	Combined dept. Economics and Trade	Total
Kangneung National College (Kangneung, Kangwondo Province	-	6	-	6
Kyunggi College (Seoul)	-	-	6	6
Kongju Normal College (Kongju, Chungcheongnam-do Province)	1	-	-	1
Kwandong College (Kangneung, Kwangwon-do)	-	1	-	1

University (Place)	Dept. of Economics	Dept. of Trade	Combined dept. Economics and Trade	Total
Kwangun Technical College (Seoul)	-	1	-	1
Kukje College (Seoul)	-	-	3	3
Kunsan College (Kunsan, Chullanam-do Province)	-	5	-	5
Duckseong Women's College (Seoul)	-	4	-	4
Dongui College (Seoul)	-	-	3	3
Masan National College (Masan, Kyungsangnam-do Province)	-	4	-	4
Myungji College (Seoul)1/	-	6	-	6
Mokwon College (Iri, Chullabook-do Province)	-	-	4	4
Mokpo College (Mikpo, Chullanam-do Province) 2/	-	-	-	-
Pusan Industrial College (Pusan)	-	-	6	6

Univeristy (Place)	Dept. of Economics	Dept. of Trade	Combined dept. of Economics and Trade	Total
Sangji College (Wonju, Kangwondo Province)	-	2	-	2
Seoul City College (Seoul)	-	-	5	5
Sejong College (Seoul) 3/	-	7	-	7
Andong National College (Andong, Kyungsang-book-do Province)	-	3	-	3
Inchon College (Inchon)	-	2	-	2
Cheonju College (Cheonju, Chullabook-do Province)	-	3	-	3
Cheongju Mormal College (Cheongju, Chungcheong-book-do Province)	1	-	-	1
Hansung College (Seoul)	-	-	1	1
Total				74

Notes: 1. Myungji College is elevated to the status of a university now.

2. Departments of Economics and Trade operate without a permanent staff member.

3. Sejong College is now elevated to a status of a university.

The following is the number of economics teaching staff at two-year Junior Colleges in Korea. The common characteristics in the junior colleges are that they do not run the Department of Economics but of Trade.

Beahwa Women's Junior College has 1 member of teaching staff, Pusan Kyungsang Junior College 3 members, Myungji Business Junior College 1 member, Daiil Business Junior College 1 member, Hansa Business College 2 members, Inchon Junior College 2 members, Shinku Junior College none, Changan Junior College 2 members, Sokcho Kyungsang Junior College 3 members, Chungnam Kyungsang Junior College 2 members, Kunsan Business Junior College 2 members, Kwangju Kyungsang Junior College 2 members, Mokpo Business Junior College 2 members, Sogang Business Junior College 2 members, Seongin Kyungsang Junior College 1 member, Kimcheon Business Junior College 1 member, Youngju Kyungsang Junior College 3 members, Pohang Business Junior College 4 members, Chinju Business Junior College 1 member and Changwon Kyungsang Junior College 2 members of economics teaching staff.

3. Student Enrolment

The total number of undergraduate students enrolment at the Departments of Economics and Trade in 1982 was 16,418 and 15,103 respectively totalling 31,521 (see Table 1). As compared with 1970 when there were 5,684 undergraduate student enrolment at departments of economics and 1,892 at departments of trade, the increase was very marked. The student enrolment at departments of economics increased by 289 per cent in twelve years and that at the departments of trade by 798 per cent during the same period.

The total number of graduate students enrolment at the department of economics in 1982 was 937, of which 784 students were working for Master's and 153 for the Ph.D degree. The total number of graduate students at the department of trade in 1982 was 1,143 of which 1,084 were working for Master's and 59 for the Ph.D. degree. As compared with 1970, the increase of graduate students at the department of trade is particularly marked. There were only 5 Master's students and no Ph.D. student at departments of trade in 1970. In the departments of economics there were 151 graduate students, of which 134 were Master's degree students and 17 Ph.D. Students.

The increase of student enrolment at the departments of economics and of departments of trade reflected the general trend of increase in the number of undergraduate and graduate students in Korean universities and colleges. For example, there was a

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TABLE 1: *Number of Departments and Student Enrolment at Graduate and Undergraduate Level of Education*

Year	Department	Undergraduate Course						Graduate Course					
		Number of Departments	Student Enrolment					Number of Departments			Student Enrolment		
			Total	1st year	2nd year	3rd year	4th year	Total	Master	Doctor	Total	Master	Doctor
1970	Grand Total	1,120	146,414	40,616	37,339	35,532	32,921	813	532	281	6,640	6,122	518
	Economics	33	5,684	1,196	1,384	1,495	1,609	38	22	16	151	134	17
	International Trade	19	1,892	575	544	387	386	4	3	1	5	5	0
1975	Grand Total	1,427	208,986	58,253	55,286	49,385	46,062	1,230	808	422	13,870	12,351	1,519
	Economics	35	5,281	1,000	1,398	1,487	1,396	47	27	20	451	396	55
	International Trade	31	3,866	813	1,044	1,102	907	14	12	2	511	508	3
1980	Grand Total	2,575	402,979	130,395	112,345	88,220	72,019	1,757	1,091	666	33,939	29,901	4,038
	Economics	58	8,024	1,357	2,589	2,209	1,869	48	29	19	801	722	79
	International Trade	98	10,744	3,299	4,024	1,916	1,505	25	16	9	917	901	16
1981	Grand Total	2,728	535,876	199,635	132,989	121,003	82,249	2,076	1,338	738	44,731	39,153	5,578
	Economics	69	9,349	644	3,578	2,955	2,172	56	31	25	903	771	132
	International Trade	79	12,775	1,279	5,269	4,392	1,835	39	28	11	997	968	29
1982	Grand Total	2,924	661,125	219,364	192,166	143,316	106,279	2,261	1,454	807	54,208	46,994	7,214
	Economics	77	16,418	5,443	4,663	3,739	2,573	70	41	29	937	784	153
	International Trade	92	15,103	4,343	4,199	4,227	2,334	40	28	12	1,143	1,084	59

Sources: *Mungyo Tongkye Yeonbo* (Statistical Yearbook of Education) for 1970, 1975, 1980, 1981 and 1982 total undergraduate student enrolment of 146,414 and graduate student enrolment of 6,640 in Korea in 1970. The undergraduate student enrolment increased to 208,686 in 1975, to 402,979 in 1980, to 535,876 in 1981 and finally to 661,125 in 1982. The graduate student enrolment increased to 13,870 in 1975, to 33,939 in 1980, to 44,731 in 1981 and finally to 54,208 in 1982. The drastic increase of undergraduate students especially after 1980 reflects the reform of educational system in Korea when the government began to increase the admission quota of each university and college to accommodate the growing student clientele.

There were only 33 departments of economics which offered undergraduate courses while 38 departments of economics offered graduate courses in 1970. In the same year, only 19 departments of trade offered undergraduate courses and four offered graduate courses. However, the number of departments of economics and of trade increased to 35 and 31 in 1975, and to 58 and 98 in 1980 respectively. In contrast to the rapid increase in the number of departments of trade during the 1970s, there was no increase, or rather there was a decrease, in the number of the departments of trade during the 1980s. However, the number of departments of economics increased steadily from 58 in 1980 to 69 in 1981 and 77 in 1982. The departments of economics and trade that offered graduate courses also increased from 38 and 4 in 1970 to 47 and 14 in 1975, to 48 and 25 in 1980, to 56 and 39 in 1981 and finally to 70 and 40 in 1982 respectively.

The number of undergraduate students registered with the departments of economics and of trade accounted for less than 5 per cent of the total student population for the last decade. They accounted for 5.1 per cent of total student population in 1970 but the declined to 4.4 in 1975; it was 4.7 in 1980, 4.1 in 1981, and 4.8 in 1982. Until 1982, the undergraduate students registered with the department of economics did not increase as fast as the total student population. The economics undergraduates as a proportion of total student population was 3.9 per cent in 1970 which declined to 2.5 per cent in 1975, 2.0 per cent in 1980 and 1.7 per cent in 1981. This percentage rose to 2.5 in 1982.

The graduate students registered with the department of economics and trade accounted for 2.4 per cent of total graduate students in 1970, 6.9 per cent in 1975, 5.1 per cent in 1980, 4.2 per cent in 1981, and 3.8 per cent in 1982.

4. Economics Curricula

a) Undergraduate Course in Economics

Current curricula offered by the Department of Economics of major universities in Korea vary little; on the whole they are more or less similar. This is supported by the analysis of the courses offered by the departments of economics at eleven major universities in Seoul. They are Seoul National University, Yonsei University, Korea University, Sogang University, Chungang University, Sungkyunkwan University, Hankuk University of Foreign Studies, Hanyang University, Konkuk University, Kyunghee University and Ewha Women's University. Usually, the first year is devoted to following the courses on liberal arts and sciences and the Introduction to Economics is taken as a preparation for future years.

The students tend to devote themselves more to the study of economics from the second year on. The following courses are mostly offered in all universities. (* refers to the required, compulsory courses).

The Second Year Course: Principles of Economics*, Micro-economics*, Macroeconomics*, Mathematics for Economists*, Statistics for Economists* and Economic History*.

The Third Year Course: Money and Banking*, Public Finance*, History of Economic Theory*, International Economics*, History of Economic Thought, Mathematical Economics, Econometrics, Labour Economics, Agricultural Economics, Economic Planning, Theory of Economic Policy, Inter-industry Economics, International Trade, International Monetary Economics, Korean Economic History, Monetary Policy, Economic Policy for Agriculture, Analysis of Business Cycle, Fiscal Policy, Modern Economic History.

The Fourth Year Course: Korean Economy, Comparative Economic System, Economic Development, Economics of Taxation, Industrial Organization, Regional, Resource and Environmental Economics, Readings in the Classics of Economics.

The above courses can be roughly classified into broad categories of the theoretical economic field, the economic policy field, the economic history field, the public finance and money field, the international economics field and others. It may be worthwhile to characterize the economics curricula by each in broad categories.

In the field of theoretical economics, Korea is no exception in teaching the neo-classical synthesis to the students as mainstream economics. This trend appears very well in the curricula of the Korean universities, especially in the courses entitled Principles of Economics, Microeconomics, Macroeconomics, and Money and Banking, which are almost always required as compulsory subjects to the students. Most of the textbooks used for these courses, whether written in foreign languages or in Korean, are those authored by the scholars who are sympathetic to the neoclassical synthesis.

In addition, at most of the universities, mathematics and statistics are offered as compulsory subjects together with mathematical economics and econometrics. The latter two are often offered as elective courses. These courses reflect the increasing trend of quantification in economic science in Korea. It is one of the peculiar aspects of the teaching of economics in Korea that the institutional economics, radical economics and economics of socialism are not taught as separate courses but are treated in the course on the History of Economic Thought.

The teaching of economics in the field of economic policy has become increasingly attractive as Korea continued her sustained high growth during the last two decades. The formulation and implementation of four successive Five Year Economic Development Plans since 1962 created an academic atmosphere where Economic Planning and the Theory of Economic Development became important and attractive courses. Apart from these two courses, the courses on government economic policies such as Fiscal Policy, Monetary Policy, Agricultural Policy and Regional, Environmental and Resource Policy became popular with senior students.

In the field of economic history, several courses such as Korean Economic History, Oriental Economic History and Western Economic History are offered. Korean Economic History has become a very popular subject with those students who regard the emphasis on mathematical approach to economics as too difficult or unnecessary.

The increasingly expanding government sector has added to the importance of the subject of public finance. In addition, the increasing interest in the government activity in the field of taxation and money attracted many students to the study of Fiscal Policy, Monetary Policy, and Economics of Taxation.

Of all courses offered in the departments of economics in Korea, perhaps the course on international economics has become the most popular and sought-after subject during the last ten years. Since 1962, when the first Five Year Development Plan was implemented, Korea's development strategy has followed an outward-looking policy. This policy has had two pillars which were the export-oriented model of development on the one hand and the active solicitation of foreign capital on the other. The outward-looking strategy implied that the national economy had increasingly become open and the public awareness of the problems of international economy had grown commensurately. It was at this time that the departments of (international) trade were newly created at the universities. International economics is almost a required, compulsory course almost in all universities in Korea.

Many universities offer readings of classics in economics, which intend to give some historical perspective of economic theory to students. Readings of major works in modern economics is another course which is offered to students. Apart from these the course on the Korean Economy is offered by all universities. This course enables students to analyze the characteristics of Korean economic development by means of a simple economic theory. Students will be asked also to find out what problems Korea will face in the future and many students are interested in the course because they are curious whether the economic theory imported from the West can explain well the reality of the Korean economy. Students who are interested in the indigenization of economic theory tend to attend the course on the Korean economy to test the utility of Western economic theory in the Korean economy setting.

b) Graduate Course in Economics

Education the graduate school has been intensified since 1981 and yet the mainline of university education in Korea is still the undergraduate courses. Accordingly, the curricula in the graduate level have not much developed; they do not differ too much from those offered to undergraduate students, except perhaps that the prefix "Advanced" is attached to those courses offered to the undergraduate students. As in the case of undergraduate training, therefore, the mainstream economic theory i.e. neo-classical synthesis, is the basis of graduate teaching. Graduate schools in most universities offer Advanced Microeconomics and Advanced Macroeconomics as required, compulsory courses together with Mathematical Statistics and Econometrics. To those who wish to specialize in Economic History at the graduate level Mathematical Statistics and Econometrics are usually compulsory subjects.

One characteristic of economics teaching at the graduate level that is different from teaching at the undergraduate course is the most of the graduate schools do not have full-time professional staff. Most of the professional staff are those who teach economics to the undergraduate students and therefore they are not able to cover all areas of specialization in each university. Realizing this limitation, several universities began to organize cross-credit systems through which they recognize the credits earned in other universities. For example, Yonsei, Sogang and Ewha Women's universities co-operate in this scheme and so do Inha, Chungang and Soongjeon universities as well.

c) Economics Curricula at Seoul National University

Seoul National University is one of the leading universities in Korea which influences other universities in course design and curriculum formulation. This is particularly true in the case of the department of economics. In this regard it may be worthwhile to introduce the curricula of the department of economics and the department of trade in Seoul National University.

1) Curricula at the Department of Economics

i) Undergraduate Course: The Department of Economics offers 18 undergraduate courses each semester. Some of the more important courses are as follows; Principles of Economics to be taken after the course on the Introduction to Economics which is being offered as one of the liberal arts subjects to almost all first year students regardless of their area of specialization in later years. Microeconomics, Macroeconomics, Mathematics for Economists, Introductory Statistics for Economists, Economic History, Modern Economic History, Mathematical Economics, Econometrics, Money and Finance-Monetary Policy, Public Finance, Economic Theory for Agriculture, Economic Policy for Agriculture, Labour Economics, Economic Planning, Interindustry Economics, Analysis of Business Cycle, Theory of Economic Policy, Oriental Economic History, Economic History of Selected Countries, Korean Economic History History of Economic Thoughts, History of Economic Theory, Economics of Taxation, Industrial Organization, Regional, Resources and Environmental Economics, Economic Development, Comparative Economic Systems, Korean Economy, Readings of Classics in Economics, Readings of Major Works in Modern Economics, Seminar in Economic analysis, International Trade, International Balance of Payments.

ii) Graduate Course: The Department of Economics offers 20 graduate courses per semester. Some of the important courses are Advanced Microeconomics, Advanced Macroeconomics, Advanced Economic History, Advanced Economic Development, Advanced History of Economic Thought, Advanced Western Economic History, Advanced Industrial Economics, Advanced Distribution Theory, Advanced Korean Economic History, Advanced Public Finance. Advanced Public Economics, Advanced History of Western Economic Thought, advanced Regional, Resources and Environmental Economics, Advanced Labour Economics, Advanced Economic Statistics, Advanced Money and Finance, Advanced Mathematical Economics, Advanced Econometrics, Advanced Economic Theory, Seminar in Economic Analysis, Seminar in Economic Theory and Seminar in Economic Policy. These courses are offered to the graduate students who have registered for Master of Arts degree.

For those who have registered for the Ph.D. degree, the following courses are being offered: Microeconomics, Macroeconomics, Economic History, Public Finance, Korean Economic History, Distribution Theory, Labour Economics, Agricultural Economics, Monetary Theory, Monetary Policy, Economic Planning, Economic System, Economic Policy, Mathematical Economics, Econometrics, History of Economic Thought, History of Western Economic Thought, and History of Korean Economic Thought.

2) Curricula at the Department of Trade

i) Undergraduate Course: The courses offered to the undergraduate students at the Department of Trade are as follows: Intermediate Price Theory, Intermediate Income Theory, International Economic History, International Trade, Balance of Payments, International Monetary Economics, International Fiscal Co-ordination, Resource Economics, Economic Growth, International Economic Organization, Regional Economics, International Economic Co-operation, Economic Intergration, International Trade Policy, Development Economics, International Capital Movement, Multinational Corporation, Economics of Technology, Theory of Tariffs, Area Studies, Theory and Practice of Korean Trade, International Trade Systems, Reading Seminar in International Trade, Reading Seminar in Balance of Payments, Reading Seminar in International Monetary Economics, Reading Seminar in International Economics, Research Seminar in International Monetary Economics, Classics in International Economics, Classics in International Economics, and Topics in International Economics.

ii) Graduate Course: Courses offered to the Master of Arts degree students are as follows: Exercise in Price Theory, Exercise in Advanced Price Theory, Pure Theory of International Trade, Exercise in Income Theory, Exercise in the Theory of Income Determination, Exercise in Economic Integration, Balance of Payments Adjustment Policy, Theory of Balance of Payments, International Economic Policy, International Development Aid, International Public Finance, Exercise in International Capital Movement, International Monetary System, Quantitative Analysis of International Trade, Economics of Underdeveloped Economy, Trade and Welfare, Quantitative Analysis of Economic Variables, Macroeconomic Policy, Theory of International Trade in the Planned Economy.

Courses offered to the students on the Ph.D. course are as follows: Exercise in the Theory of International Trade, Exercise in the Theory of Balance of Payments, Exercise in the Theory of International Finance, Exercise in Trade Policy, Exercise in International Public Finance, Exercise in Multinational Corporations, Exercise in International Economic Relations and Exercise in International Economic Organization.

5. Research Institutes in Korea

There are several autonomous research institutes, both public and private, that are devoted to economic research in Korea. The more important ones would be the Korea Development Institute, Korea Institute for Industrial Economics and Technology, Korea Rural Economics Institute, Korea Physical Planning Institute, Korea Economic Research Institute, Institute for Asian Economies, Korean Industrial Development Institute, and Korean Economic Research Centre.

Korea Development Institute is financed by the national budget through the Economic Planning Board and Korea Institute for Industrial Economics and Technology through the Ministry of Commerce and Industry. Korea Rural Economics Institute is financed by the budget through the Ministry of Agriculture and Fishery, and the Korea Physical Planning Institute by the Ministry of Construction. Korea Economic Research Institute is a research arm of the Federation of Korean Industries and Korea Economic Research Centre is the research institute established by the Korea Chamber of Commerce and Industry.

Most of the universities have their own economic research institutes in one form or another. For example, Seoul National University has the Institute of Economic Research but there are no full-time researchers at the Institute. Faculty members of the Department of Economics and the Department of Trade automatically become the research associates of the Institute, carrying out research projects occasionally. This system is totally different from the Japanese practice where the University Institute of Economic Research usually has as many full-time professors as those at the Faculty of Economics.

Unlike the research institutes attached to the university, the state-funded research institutes are well staffed. Of these institutes, Korea Development Institute (KDI) and Korea Institute for Industrial Economics and Technology (KIET) are well known and have been very active in research and government consulting. Therefore it may be worthwhile to introduce more in detail these two research institutes. 6/

a) Korea Development Institute (KDI)

KDI was founded in 1971 as an autonomous government-financed, policy-oriented economic research organization. Since its establishment KDI has pursued three primary objectives:

1) To conduct research relevant to the problems of Korea and its relations with other countries for the purpose of developing long-term development strategies;
2) To assist the government in drafting Korea's Five-Year Economic and Social Development Plans; and
3) To provide consultation and practical policy alternatives for the government's short-term management of the economy.

As these objectives indicate, KDI deals with a wide range of domestic and international economic issues involving the government and international organizations. The institute also engages in numerous non-research activities that contribute to the research programme or assist the government and the private sector in their efforts to promote economic co-operation with other countries.

The major activities of the KDI are as follows; research, formulating five-year plans, consultation on short-term economic management policy, economic forecasting, organization of symposia and seminars, international collaboration, and publications.

All aspects of the Korean economy are considered in the course of the Institute's research activities; income, employment, prices, money and banking, public finance, international trade, industrial organization, agriculture, labour-management relations, population, social development and so on. In addition to the domestic policy concerns, one purpose of the research activities at KDI is to provide the international community with academic studies on the Korean economy in English. These studies enable the foreign audience to better understand Korea's economic status and policy directions.

Since its establishment KDI has played a major role in the formulation and drafting of the Five-Year Economic and Social Development Plans. In the development of the current plan KDI organized numerous public policy forums and symposia to seek out public opinion on major issues. With the information so acquired KDI prepared issue papers which served as guidelines for the policy makers at the Economic Planning Board. In the final stage of preparation KDI checked the internal consistency of the Plan for the government.

In the short-term management of the national economy, KDI works on a daily basis with the Economic Planning Board; and KDI's role in this process has been to analyze government policy may choose.

As part of its original mission, KDI through development and use of its economic model, is deeply involved in the analysis of short-term domestic and foreign economic trends. Beginning in May 1982, the results of KDI's short-term economic forecasting are published regularly in its Quarterly Economic Bulletin.

Symposia and seminars have also been arranged to promote discussions of pertinent issues and many foreign scholars are being invited to give papers on relevant matters.

Permanent ties are maintained with numerous foreign research institutes with which KDI regularly engages in research projects and in exchange of data to update its data bank. These organizations include the Mitsubishi Research Institute in Japan, the East-West Center at the University of Hawaii, the World Bank, Economic and Social Commission for Asia and the Pacific (ESCAP), Harvard Institute for International Development as well as the governments of the ASEAN countries.

KDI works closely with the Korean Economic Institute in Washington, D.C., USA to promote economic co-operation between the two countries. KDI provides the Institute with data and analyses on the latest economic and policy developments in Korea. Under the supervision of its American directors, Korean Economic Institute publishes a bi-monthly newsletter and organises lectures and seminars.

KDI publishes many works in English and a much larger number in Korean every year. The Institute also publishes a quarterly journal in Korean entitled *The Korea Development Review* in which some of the research results of the fellows of the Institute are published.

The research staff at KDI is composed of some thirty senior fellows who are helped by a large number of research associates and assistants. The majority of the senior fellows received their advanced training in economics abroad and hold Ph.D. degrees from major foreign universities. The President of the Institute is Professor Kim Kihwan, who is Ph.D. from the Univeristy of California, Berkeley.

Following table summarizes the staff position in terms of their specialization.

Specialization	Frequency
International Economics	6
Industrial Relations/Organization	5
Industrial Economics	4
Labour Economics	4
Socio-economic Development and Social Security	4
Economic Forecasting	3
Development Economics	3
Public Finance/Public Expenditure and Taxation	3
Monetary Economics	2
International Trade	2
Econometrics	2
Agricultural Economics	2
Income Distribution	1
Regional Economics/Urban and Regional Planning	1
Commodities	1
Corporate Finance	1
Public Enterprise	1
Industrial Policy	1
Computer Science	1

Specialization	Frequency
Health	1
Education	1

The Korea Development Institute is organized as follows: Under the general direction of the Board of Directors, KDI is headed by the President who is assisted by the Vice President and the Research Co-ordinator. KDI consists of Research Planning and Co-ordination Office which co-ordinates the research activities of its staff, overlooks International Development Exchange Programme which organizes the international seminars and exchange programme, Computer Centre, Library and Administration Office. KDI is advised by the Research Advisory Committee, whose members are drawn not only from the KDI but from the outside.

b) Korea Institute for Industrial Economics and Technology (KIET)

KIET was established in 1982 through the merger of two research organizations, the Korea International Economic Institute (KIEI) and the Korea Scientific and Technological Information Centre (KORSTIC). KIET is also an autonomous non-profit making research organization whose main objectives are to help develop Korean industry and promote trade. More specifically, the primary objectives of the KIET are:

1) To conduct research on industry for the purpose of assisting in the industrial development of Korea to provide policy alternatives and relevant information both to government and and business.

2) To contribute to the expansion of international trade and economic co-operation by analyzing current development of the world economy and the economic conditions of individual countries and regions.

3) To provide technical information, business consultation and practical advice to industry.

4) To collect and analyze information on industry, trade and technology and to operate a data bank, unique in Korea, for the nationwide dissemination of information.

There are two distinct branches of research at the KIET. Industrial studies programme which covers major industries are conducted with principal emphasis put on the adjustment of the Korea's industrial structure. Pursuant to this emphasis, major and critical industries are scrutinized and strategies for individual progress are formulated in harmony with a cohesive, comprehensive plan for the entire structure. Concurrently, research assistance is provided to the ongoing efforts of the various industries to develop new products and enhance productivity.

The other branch of research, the area studies programme, examines economic and business conditions in individual countries and regions abroad as well as the world economy. Marketing research is also conducted to identify promising export commodities and to promote expoets. In addition, policy recommendation is provided to the government to promote international trade and economic co-operation.

In addition to the industrial and area studies, the Institute has a current survey and analysis function which monitors day-to-day development in the world economy and analyzes the implications of important current industrial and economic developments around the globe.

In order to disseminate significant findings of research, the KIET publishes books, monographs, reports, bulletins and other instruments of information. Its staff also participates actively in a variety of advisory and consultative activities for the government and private enterprises.

KIET collects, analyzes and processes information covering a wide range of the national economy, to include trade, marketing, industry, science and technology in order to make it readily usable and available. It also provides technical consultation to industries and other users concerning development of new techniques, new products and the introduction of foreign technology. KIET also collects and maintains trade catalogues of some 20,000 foreign manufacturers, among which are 10,000 U.S. manufactures' trade catalogues on visual search microfilm file (VSMF). KIET also provides research on products of Korean scientists and engineers to foreign countries by publishing English editions. It also holds numerous seminars and sponsors symposia with visiting scholars and the proceedings are selectively published.

At present the professional staff numbers 29, of whom 16 are senior members with Ph.D. degrees. They are all economists or other social scientists with both domestic and foreign educational background. KIET is headed by Sakong Il, Ph.D. (UCLA), the Vice President is O. Kwanchi, Ph.D. (Vanderbilt). The senior researchers are: Song Hee Yhon, Ph.D. (Syracuse), Development Economics

The research specializations of the senior staff are tabulated below.

Specialization	Frequency
Information and Technology	9
Industrial Economics	7
International Economics	3
Econometrics	3
Development Economics	2
Regional Economics	2
Japanese Economy	1
Chinese Economy	1
Russian Economy	1
European Economy	1
Computer Science	1

Note: (One resident researcher in Japan, and one in Saudi Arabia).

The Korea Institute for Industrial Economics and Technology is organized as follows; Under the general guidance and direction of the Board of Trustees, the President is in charge of the institute operations. He is assisted by the Vice-President. KIET consists of Industry Studies Department (which has Industry Studies 1, 2, 3, and 4 Sub-Departments), Area Studies Department (which has Area Studies 1, 2 and 3 Sub-Departments), Technology Information Department (which has Technology 1, 2 and 3, and Patent Information Sub-Departments) and General Analysis and Planning

Department which operates the overseas offices in Tokyo and Jeddah, Information Service Department which is in charge of local branches in Pusan, Taegu, Kwangju, Daeduu and Masan. KIET also operates the Computer Systems Laboratory and Information Resources Center.

c) The Institute of Economic Research, Seoul National University 7/

Perhaps it may be useful to describe the organization and the function of the Institute of Economic Research at Seoul National University as the institute has been a model to many research institutes now attached to the universities in Korea.

The aim of the Institute established in February 1961 is to conduct both theoretical and empirical research on economic problems in Korea and other developing countries. The main emphasis is put on empirical research but the Institute by no means neglects the importance of formulating theoretical models based on empirical findings. The Institute has three divisions; the Research Division, the Documentation Centre and the General Affairs Division. The Research Division consists of nine sub-divisions: general economic theory, monetary economics and financial institutions, public finance and taxation, economic planning and regional economics, international economics and the world economy, industrial organization and labour problems, agricultural economics, economic statistics and econometrics, and history of economic thought and economic history.

The Institute has been publishing the quarterly *Kyungje Ronjip* (Korean Economic Journal) since 1962. Each issue contains the theoretical and empirical works of both domestic and foreign scholars, book reviews, and reports on the international meetings of economic societies abroad. The Institute also publishes annually a journal entitled, *Seoul National Univeristy Economic Review,* which was launched in 1967. This journal intends to introduce mainly in English the works on the Korean economy of foreign scholars and on the other hand to make the works of Korean economists available in foreign languages. The Institute also publishes *Selected Articles and Economic Research Series.*

The Institute conducts monthly seminars to promote academic activities of the staff members. In addition to the monthly seminar which started in 1974, there is an annual symposium focused on major issues. The topics discussed in the symposia in the past were "The Transformation of the World Economic Order and the Problems of Modern Economics" (1975), "The Economics of Adam Smith and the Korean Economy" (1976), "The Methodology of Economics and the Economic Studies in Korea" (1977), "The Methodology of Economic Planning and the Economic Development Plans in Korea" (1978), "Inflation and Stabilization Policies in Korea" (1979), "Change in the International Economic Environment and the Korean Economy" (1980), "Development and Tasks of Economic Research in Korea" (1981), and "Korea's Development Experience and Development Plans" (1982).

The Institute also undertakes research projects which make substantial contribution to the formulation of government economic policies. So far the Institute has undertaken seventeen research projects.

III. Major Trends in Economic Research

By making use of data provided by Lee Kijoon's *Charyo Hankuk Kyungjehak Baldalsa* (Data on the History of Development of Economic Science in Korea) published in 1980 and the *Hankuk Chulpan Nyunkam* (Yearbook of Publications in Korea) for 1954 to 1980, Kang Myungkyu has found several interesting results as regards the trends in economic research for the last eight decades. 8/

According to Kang's study, there were 7,815 economics articles published by the Korean scholars between 1897 and 1979, of which 1,111 articles were written in foreign languages, mainly in Japanese before 1945, and in English after 1945. There were 408 doctoral dissertations written during the same period, of which 173 theses were in the foreign languages. There were 1,272 books on economics published by the Korean economists and 534 foreign publications were translated into Korean during the same period. Table 2 shows the breakdown by period and kind of publications.

TABLE 2: Trends in Publications on Economics: 1897-1979

period / kind	1897-1909	1910-1945(2)	1945(3) -1950	1951-1960	1961-1965	1966-1970	1971-1975	1976-1979(4)	Total
Articles (in foreign languages)	157 (1)	1,648 (379)	419 (0)	253 (23)	667 (132)	1,224 (132)	2,229 (275)	1,219 (169)	7,815 (1,111)
Doctoral Theses (in foreign languages)	-	6 (6)	-	16 (14)	22 (19)	86 (35)	202 (65)	75 (34)	408 (173)
Translations (articles)	17 (9)	49 (21)	79 (21)	145 (1)	65 (3)	29 (4)	96 (39)	54 (16)	534 (114)
Books	12	54	64	156	235	153	306	292	1,272

Sources: Kang Myungkyu, *op. cit.*, p. 404

The trends in research come out more clearly when we classify the publications according to the area of specialization. By making use of the classification used in the *Journal of Economic Literature* by the Americal Economic Association, we have classified the publications into 10 broad categories. They are 000 (General Economics; Theory; Histoty; Systems), 100 (Economic Statistics), 300 (Domestic Monetary and Fiscal Theory and Institutions; Insurance), 400 (International Economics), 500 (Trade Relations; Commercial Policy; Economic Integration), 600 (Industrial Organization; Technological Change; Industry Studies), 700 (Agriculture; Natural Resources), 800 (Manpower; Labour; Population) and 900 (Welfare Programme; Consumer Economics; Urban and Regional Economics).

During the period between the end of second world war in 1945 and the Korean war in 1950, for example, there were 64 books and 419 articles published, and 58 foreign publications translated. The majority of books and translations of foreign publications was concerned with the category 000. When a more detailed analysis of this category is conducted, it is found that whereas the books were mainly concerned with introductory textbooks or economic history, the translations were more in the field of economic thought and economic systems. In the field of professional articles, the agricultural problems and economic development appear to have been the most popular area research during this period.

TABLE 3: Trends in Economic Research: 1945-1950

Area	000	100	200	300	400	500	600	700	800	900	Total
Books	32	13	2	4	-	-	-	12	1	-	64
Translations	53	3	-	-	-	-	-	1	1	-	58
Articles	86	108	3	24	23	-	28	116	22	9	419

Sources: Kang Myungkyu, *op. cit.*, p. 422

During the 1950s, there were 156 books published in the field of economics, 144 translations of foreign publications and 253 professional articles (see Table 4). The detailed analysis of the content shows that 35 per cent of the books published were introductory textbooks, 22 per cent were on the problems of growth and development, and 16 per cent on the monetary and public finance problems. This reflected the economic reality of the days rather vividly as there was a need for a more systematic education in economics and for solving the economic problems caused by the Korean war.

TABLE 4: Trends in Economic Research: 1951-1960

Area	000	100	200	300	400	500	600	700	800	900	Total
Books	55	35	8	26	7	-	3	15	5	2	156
Translations	97	20	3	10	4	-	-	4	6	-	144
Articles	128	32	5	12	9	-	7	37	19	4	253

Sources: Kang Myungkyu, *op. cit.*, p. 426

The translations of the foreign publications were still concentrated in the category 000. One of the characteristics in the field of translations during the 1950s is that unlike during the 1960s and 1970s, there were many translations of foreign publications. This was mainly due to the fact that there was a great demand for new economic thoughts such as Keynesian economics which were needed to replace the traditionally strong economic ideology such as Marxism. This is reflected rather well in the concentration of foreign publications translated mainly in the field of economic theory and economic thought. This trend is further substantiated by the concentration of professional articles in the category 000.

Upon entering the 1960s, two important factors began to influence the economics profession in general and the economic research in particular. One factor is that Korea, by adopting an outward-looking development policy and using the five year development plan as its major development tool, began to develop fast. The fast growth of the Korean economy not only began to influence the economics teaching in Korea but also the demand for economics training increased considerably. The economics faculty has become one of the very brighter students began to flow in.

The other factor is that unlike during the 1950s, when most of the university economics faculties had had training either in Korea or Japan, the breed of economists who had been trained in the United States or Europe began to return to Korea to teach and, sometimes, to join the government as major policy makers.

During the period between 1961 and 1979, it can be seen that the number of professional articles doubled every five years, that there was a marked decrease in the number of translations of foreign publications and that the number of books published increased over the years.

The drastic increase in the number of articles can be interpreted as reflecting the normalization of economic research in Korea. The share of category 000 in the total number of articles was the highest during the 1960s but, entering the 1970s, the share of category 700 began to assume the highest, reflecting the change of trends in economic research. Also interesting is the relative decline of the growth and development subject and the relative increase of the share of articles in the field of international economics. There is also a slight increase in the number of articles in the field of social welfare and consumer economics, reflecting the increasing concern for income distribution in Korea.

TABLE 5: Trends in Economic Research: 1961-1979

Year	Area	000	100	200	300	400	500	600	700	800	900	Total
1961-1965	Books	96	32	10	49	8	-	6	23	5	6	235
	Translations	32	17	1	2	3	-	2	2	2	1	62
	Articles	177	96	12	66	67	-	30	95	85	39	667
1966-1970	Books	60	20	4	29	8	-	5	12	12	3	153
	Translations	5	7	1	6	1	-	1	2	1	1	25
	Articles	250	152	33	72	149	-	54	216	197	102	1,225
1971-1975	Books	115	37	21	27	34	-	8	34	18	12	306
	Translations	28	10	2	5	4	-	-	4	2	2	57
	Articles	386	242	94	105	468	-	109	339	325	161	2,229
1976-1979	Books	105	40	19	36	34	-	12	17	19	10	292
	Translations	20	4	1	2	4	-	-	4	1	4	38
	Articles	227	159	67	61	143	-	62	238	141	120	1,218

Sources: Kang Myungkyu, *op, cit.*, p. 432

On the whole, the academic interest of the economics profession in Korea has increasingly become diversified during the 1960s and 1970s and there is every reason to believe that the economics profession has increasingly related their research to the real economic problems of the day. This trend is best exemplified in the fact that 86 per cent of the total articles written in the field of international economics are concerned either with trading relationship or foreign capital and very few articles are written in the field of pure theory of international economics. 9/ This fact together with the relative decline in the number of articles written in the field of domestic finance and money reflects the increasing awareness of the Korean economists about the fact that the Korean economy relied more on the export market than on the domestic market, and on foreign savings than on domestic savings.

IV. Problems the Economics Profession Faces in Korea

As there are many universities that produce economics graduates every year, it is rather difficult to generalize what sort of job openings there are for them. However, for those graduates from leading universities such as Seoul National, Yonsei, Korea and Sogang Universities, there are several job opportunities. Although many of them go on to the graduate school to pursue for an advanced degree in economics or management, some may join the Bank of Korea, Korea Development Bank, Export-Import Bank of Korea, Korea Exchange Bank and even some other commercial banks.

Some of the competitive-minded students who have successfully passed the higher civil service examination can join the civil service in the Ministry of Finance, Economic Planning Board, Ministry of Commerce and Industry, and other economic ministries. Some are also able to join the private sector, mostly the big general trading companies such as Hyundai, Samsung, Daewoo, Sangyong, Lucky Goldstar and other groups. The job openings are rather limited to those who graduate from the lesser universities, and most of them join the private sector through a very competitive examination set by the respective business companies.

During the period before the government actively began to establish such research institutes as Korea Development Institute, Korea Institute for Industrial Economics and Technology, Korea Rural Economics Institute and others, there were a lot of research projects that were allocated by the government to the university economists. However since the establishment of these government-funded research institutes in the 1970s, the government began to concentrate its sources of fund to these institutes, with the consequence that those in the academic profession have been adversely affected. Most of the research projects carried out by these government-funded institutes tend to be closely related to the government economic and industrial policies.

There are several professional associations in Korea. They are the Korean Economic Association, Korean International Economic Association, Korean Economic History Association, Korean Labour Economics Association, Korean Tax Association, Korean Society for Fiscal Economists, Korean Statistical Society, and so on.

The Korean Economic Association has the longest history and the largest number of members, well over 1100 as of December 1983. The Association is headed by a President whose term of office is two years. There is a Vice-President and a 20 member Board Directors. The aim of the Korean Economic Association is to conduct research on economic theory, economic policy, economic history and national economic problems, and to propagate the research results among the general public as well as the professional community. The Association publishes a journal of its own.

The Korean International Economic Association is more recently founded and is a more homogeneous professional economic association. Established in 1978, the Korean International Economic Association, headed by a President whose term of office is one year and assisted by a Vice-President and a seven member Board 1983. This is not a professional association of international economics specialists but rather broadly based. Most of its members hold Ph.Ds and are trained abroad. The aim of the Korean International Economic Association is to further the study of economics and economic research in Korea and to hold lectures and seminars on related subjects.

Like many other professional associations in Korea, the major source of funds for the Korean Economic Association and the Korean International Economic Association is the membership fee. However, when holding special seminars or symposia, they rely on, and accept contributions from, the government, the Korean Scholarship Foundation funded by the Korean Traders' Association, the research institutes such as KDI and KIET, and even at times from the business community.

The number of professional economists who are involved in international collaboration varies over time but one can assert that this kind of joint research activity is more of an exception than the rule. Some scholars provide some consultancy services to the international economic organizations such as ESCAP, the World Bank, IMF, UNDP, UNIDO, FAO and WHO, but on the whole, the number of those involved in such service is also rather limited.

V. Agenda for the Future

One often characterizes the Korean economy to have taken off during the 1960s and succeeded in staying on the path of steady growth. Indeed, the Korean economy is nowadays usually taken as a model for developing countries. There is no doubt that the management of the Korean economy has thus far been successful. It appears that Korea somehow has had a comparative advantage in economic policy-making. Many of those who were trained abroad and joined the government upon return to Korea have been very influential in making the government's economic decisions. Their economic advice is now widely acclaimed to have been right. The international competitiveness of the Korean industry and Korea's economic decision-makers does not appear to be disputed.

Unfortunately this can not be said of the economics profession in Korea. Unlike the Korean economy, which is very competitive, the international competitiveness of Korea's economic profession is in great doubt. There were, and are, many able and talented Korean students at the undergraduate and the graduate level both at home and abroad but somehow the number of publications by the Korean economists in the internationally respectable journals has not increased commensurately. Therefore, it appears that the ultimate goal of the economics profession in Korea is to become internationally competitive in the professional and publications market.

The Korean economics profession was heavily influenced by the Japanese economics profession during the period before 1950 and has been equally influenced by the US economics profession since then. The American influence has become more pervasive after the 1960s when many Korean economists began to return to Korea from their study in the US. There are some who were trained in Europe, particularly in Britain, West Germany and France, but their numbers are rather limited and their influence is marginal.

The Economics profession in Korea has so far been busy in introducing and absorbing the "foreign" economic theory and there is an increasing demand for the indigenization of the economic theory based on Korea's economic reality. This demand is closely correlated with the degree of disappointment with, and the increasing reaction against, the mainstream economics -- neo-classical synthesis -- in Korea. 10/ Some economists are advocating the efficacy of the post-Keynesian theory and the policy derived therefrom 11/ and there are many more of those who continuously argue for the importance of taking a more holistic approach to the economic problems in Korea and the theory thus derived. 12/

That the Korean economics profession is at a crossroad needs no elaboration. Young economists with Ph.D. are returning to Korea in large numbers and an equally large number of aspirants are also going abroad every year to study economics. The number of professional economists is growing very rapidly and there is every reason to mobilize the potential of the Korean economists for a more meaningful academic contribution both at home and abroad. In this regard, there are several action programmes that need to be considered.

Firstly, the professional associations must be activated in Korea through the organization of frequent professional meetings. The Korean Economic Association and other similar associations should function more fully so as to become forums for the economics profession.

Secondly, there is a great need for a closer co-operation between the academic institutions and the government-funded research institutes. There is a tendency that whereas the research at the university is concentrated in the area of pure economic theory the research institutes carry out the research on more practical problems. The complementarity between the two kinds of institutions in research and teaching can not be over-emphasized. Those economic researchers at the research institutes who have recently returned from abroad can be usefully utilized for teaching new ideas and methodology in the univeristy.

Thirdly, some more incentive should be given to research in various fields of academic activities. Professional promotion at the university is not so much related to the quantity and/or quality of publications in the professional journals. Seniority in-service is the main criterion for promotion. For example, at the Seoul National University one gets the Associate Professorship after 5 years of service as an Assistant Professor, and he becomes a Full Professor after 5 years as an Associate Professor. In other universities the length of time needed for promotion is even shorter.

Fourthly, there is a need for a closer co-operation between the university and the government. Before 1979, the Prime Minister appointed a group of university economics and social science professors to advise on policy matters. The contribution of the so-called Professional Evaluatory Group was not minimal. Several of the active members of this Group were even appointed as Ministers in economic ministries. The government dismantled the Group in 1980 and instead instituted a broadly-based advisory group in each Ministry. The experience has not proved to be effective but the system has not been disbanded. However, this does not negate the necessity of co-operation between the university and the government. As the Korean economy is going through a rather difficult transitional period, there is all the more reason for the government to get sound policy advice and co-operation.

The academic standard of the Korean economics profession can not be raised overnight and its problems can not be solved in a short span of time. However, the continuous effort to remedy the problems and to upgrade the international competitiveness of Korea's economic profession is hoped to reap fruit in due course.

FOOTNOTES

1. There are several studies that survey the economics profess- in Korea before 1945. See, Lee, Keejoon, *Hankuk Kyungjehak Kyoyuk Yonku* (A study of the history of teaching of economics in Korea). Seoul, Hankuk Yonkuwon, 1982. Especially pp. 33-82. Kang, Myungkyu, "Hankuk Kyungjehak eui Bipanjok Sungchal" (Critical Reflections on the Korean Economics). *Kyungje Ronjip,* vol. 20 No. 4. December 1981, pp. 404-419.

2. Yonhee College was originally called Chosun Christian College and is now renamed Yonsei University. Korea College was originally called Bosung College and now renamed Korea University. Both universities with Ewha Women's University are the major and old private universities in Korea.

3. For the study of the economics profession in Korea after 1945, see Kang, Myungkyu. *op. cit.* pp. 422-434, and Lim, Chongchul, "Hankuk Kyungjehak Yonku" (A study of economics in Korea). In: Hong, Kim and Lim (ed.), *Hankuk Sahoekwahak Yonku* (A study of social sciences in Korea), pp. 116-124, Seoul, Bummunsa, 1977.

4. For the personal account of circumstances surrounding the foundation of the Korean Economic Association and the publication of Korean Economic Review, see Shin, Taehwan, "Hankuk Kyungjehak oshimmyun eui Hoeko" (Reflections on the 50 years of Korean economics), speech given to the Korean Economic Association on its 30th anniversary, reprinted in the *Hankuk Kyungje Shinmum* (Korean Economic Daily), April 12-13th, 1983.

5. The studies that cover the economics teaching and profession during this period include Byun, Hyungyun, "Hankuk Kyungjehak eui Jonkai Kwanjung" (Development process of Korean Economics) in *Wolkan Chosun,* February 1982, reprinted in Shin, et. al. (ed.), *Hankuk Kyungjehak eui Jemunje* (Problems of Korean Economics), Seoul, Jonyewon, 1983, pp. 39-63, Chu, Jonghang, "Hyundai Kyungjehak eui Weeki wa Hankuk Kyungjehak" (Crisis in modern economics and Korean economics), *op. cit.,* pp. 121-144, Kim, Byungju, "Hankuk Kyungjehak eui Hyunhang kwa Kwaje" (Status and Task of Korean Economics), *op. cit.,* pp. 185-191.

6. The status of the KDI and KIET is as of the end of 1981. Since then several changes have been made especially in the top management of both research institutes. For example, Dr. Kim Kihwan, President of KDI, is now Vice-Minister of

Commerce and Industry and Dr. Sagong Il, President of KIET, is the Presidential Senior Secretary for Economic Affairs. Dr. Kim was succeeded by Dr. Ahn Seungchul, Ph.D. (Berkeley), formerly the Director of Statistics Department at the Bank of Korea and Dr. Sagong by Dr. Moon Heehwa, Ph.D. (George Washington), formerly Policy Co-ordinator at the Office of the Prime Minister.

7. The Seoul National University Institute of Economic Research according to its bulletin for 1982-83.

8. Kang Myungkyu, *op. cit.*, especially pp. 404-450. According to Lee Kijoon, the books, translations, translated articles, articles and commentaries of the period between 1897 and 1948 are covered in his *Charyo Hankuk Kyungjehak Baldalsa*. Those that are covered after 1948 include books, translations (monographs) translated articles, doctoral theses of those now resident in Korea, professional articles published in Festschrift and journals published by professional economists. The names of journals are given in Lee Kijoon, *op. cit.*, p. xiv-xv. Although Kang's study includes the publications up to 1979, Lee's data cover only the period up to August 1978.

9. For a more detailed analysis of the economics publications in Korea, the following four tables (Table 1: Analysis of Articles published in Korea; Table 2: Analysis of Articles in Foreign Journals published by Korean Economists; Table 3: Analysis of Books on Economics; and Table 4: Analysis of Translations of Foreign Books and Articles) are attached. The following classification system of American Economic Association is used to analyze the contents of the following tables.

000	General economics; Theory; History; Systems
010	General economics
020	General economic theory
030	History of thought; methodology
040	Economic history
050	Economic systems
100	Economic growth; Development; Planning, Fluctuations
110	Economic growth; development; planning theory and policy
120	Country studies
130	Economic fluctuations; forecasting; stabiliza-

tion; inflation

- 200 Quantitative economic methods and data
  - 210 Econometric, statistical, and mathematical methods and models
  - 220 Economic and social statistical data and analysis
- 300 Domestic monetary and fiscal theory and institutions
  - 310 Domestic monetary and financial theory and institutions
  - 320 Fiscal theory and policy; public finance
- 400 International economics
  - 410 International trade theory
  - 420 Trade relationa; commercial policy; international economic integration
  - 430 Balance of payments; international finance
  - 440 International investment and foreign aid
- 500 Administration; Business finance; Marketing; Accounting
  - 510 Administration
  - 520 Business finance and investment
  - 530 Marketing
  - 540 Accounting
- 600 Industrial organization; Technological change; Industry studies
  - 610 Industrial organization and public policy
  - 620 Economics of technological change
  - 630 Industry studies
  - 640 Economic capacity
- 700 Agriculture; Natural resources
  - 710 Agriculture
  - 720 Natural resources
  - 730 Economic geography

800 Manpower; Labour; Population

- 810 Manpower training and allocation; labour force and supply
- 820 Labour markets; public policy
- 830 Trade unions; collective bargaining; labour-management relations
- 840 Demographic, economic
- 850 Human capital

900 Welfare programme; Consumer economics; Urban and regional economics

- 910 Welfare, health, and education
- 920 Consumer economics
- 930 Urban economics
- 940 Regional economics

TABLE 1: Analysis of Articles in Korean Journals by Sub-category

Classification Year		1970	1971	1972	1973	1974	1975	1976	1977	1978	Total
000	010	2	1	3	2	3	3	-	5	-	19
	020	3	4	8	9	10	6	11	11	5	67
	030	13	11	10	11	13	12	14	21	3	108
	040	40	44	54	54	58	60	55	76	12	453
	050	3	1	3	4	1	2	5	8	3	30
	Sub-total	61	61	78	80	85	83	85	121	23	677
100	110	5	3	4	6	8	7	9	9	2	53
	120	13	11	27	37	38	66	68	35	18	313
	130	1	5	5	3	7	13	10	5	3	52
	Sub-total	19	19	36	46	53	86	87	49	23	418
200	210	1	3	11	15	11	27	17	23	8	116
	220	2	6	1	13	2	7	12	7	-	50
	Sub-total	3	9	12	28	13	34	29	30	8	166
300	310	3	8	4	6	3	9	16	10	1	60
	320	8	5	7	10	14	16	15	11	-	86
	330	2	2	7	4	2	6	3	5	1	32
	Sub-total	13	15	18	20	19	31	34	26	2	178
400	410	3	-	7	5	5	5	3	5	-	33
	420	31	25	58	88	98	59	53	42	11	465
	430	4	12	10	6	4	4	6	9	1	56
	440	10	5	8	10	13	12	18	14	1	91
	Sub-total	48	42	83	109	120	80	80	70	13	645
600	610	10	7	7	9	6	6	11	13	2	71
	620	1	2	5	2	2	5	4	2	4	27
	630	7	5	6	4	9	15	9	20	3	78
	Sub-total	18	14	18	15	17	26	24	35	9	176
700	710	52	48	58	50	64	62	74	80	33	521
	720	4	3	8	13	23	13	25	16	13	118
	730	-	2	-	-	-	1	1	2	-	6
	Sub-total	56	53	66	63	87	76	100	98	46	645
800	810	9	3	10	14	6	3	9	3	6	63
	820	18	16	31	24	27	30	20	29	8	203
	830	2	11	27	26	13	20	12	5	7	123
	840	10	8	13	9	14	8	10	11	3	86
	850	-	3	1	3	4	4	12	5	2	34
	Sub-total	39	41	82	76	64	65	63	53	26	509
900	910	8	4	8	9	7	4	9	11	5	65
	920	2	5	6	1	8	5	8	8	6	49
	930	14	12	8	10	11	14	22	14	6	111
	940	6	12	1	8	16	13	15	10	5	86
	Sub-total	30	33	23	28	42	36	54	43	22	311
Total		287	287	416	465	500	517	556	525	172	3,725

TABLE 2: Analysis of Articles in Foreign Journals by Korean Economists by Sub-category

Classification \ Year		1970	1971	1972	1973	1974	1975	1976	1977	1978	1979	1980	Total
000	010	–	–	–	–	–	–	–	–	–	–	–	–
	020	1	4	1	4	4	4	7	–	–	6	5	36
	030	–	–	2	–	–	–	–	–	–	–	–	2
	040	–	1	1	1	–	1	–	–	–	–	–	4
	050	–	–	1	–	–	–	–	–	–	–	–	1
	Sub-total	1	5	5	5	4	5	7	–	–	6	5	43
100	110	4	2	4	2	–	2	1	1	1	3	1	21
	120	1	3	1	3	3	2	–	–	1	1	2	17
	130	–	–	–	1	3	–	–	–	–	–	–	4
	Sub-total	5	5	5	6	6	4	1	1	2	4	3	42
200	210	–	1	1	1	7	2	6	–	1	8	8	35
	220	–	–	1	–	2	1	1	1	1	4	2	13
	Sub-total	–	1	2	1	9	3	7	1	2	12	10	48
300	310	–	–	4	3	5	2	3	–	–	10	5	32
	320	1	–	–	1	2	1	–	–	–	3	3	11
	330	–	–	–	–	–	–	–	–	–	–	–	–
	Sub-total	1	–	4	4	7	3	3	–	–	13	8	43
400	410	2	1	3	3	3	–	1	–	–	3	–	16
	420	–	–	–	–	3	–	2	–	1	1	–	7
	430	1	–	3	–	1	–	1	–	–	1	–	7
	440	2	–	1	2	3	1	–	2	1	1	2	15
	Sub-total	5	1	7	5	10	1	4	2	2	6	2	45
500	510	–	–	–	1	–	2	–	–	–	1	1	5
	520	–	–	–	–	2	1	–	–	5	2	6	16
	530	1	–	–	–	–	–	–	–	–	–	–	1
	540	–	–	–	–	1	3	–	–	1	–	1	6
	Sub-total	1	–	–	1	3	6	–	–	6	3	8	28
600	610	1	–	1	2	–	1	2	1	–	3	1	12
	620	–	–	–	–	–	2	–	–	–	–	1	3
	630	–	–	2	1	–	–	1	–	1	2	2	9
	Sub-total	1	–	3	3	–	3	3	1	1	5	4	24
700	710	–	2	5	–	4	6	–	1	–	1	5	24
	720	–	–	–	–	–	–	–	–	–	1	1	2
	730	–	–	–	–	–	–	–	–	–	–	–	–
	Sub-total	–	2	5	–	4	6	–	1	–	2	6	26
800	810	–	–	1	–	1	–	–	–	–	1	–	3
	820	–	1	1	–	2	1	–	–	1	1	–	7
	830	–	–	–	–	–	–	–	–	–	2	–	2
	840	–	–	–	–	1	2	2	1	1	3	1	11
	850	–	–	–	–	–	–	–	–	–	–	–	–
	Sub-total	–	1	2	–	4	3	2	1	2	7	1	23
900	910	–	–	2	–	1	–	–	2	–	1	–	6
	920	1	1	2	–	–	1	–	–	–	–	–	5
	930	–	3	1	1	–	–	–	–	–	2	3	10
	940	–	1	1	–	–	–	1	–	–	1	–	4
	Sub-total	1	5	6	1	1	1	1	2	–	4	3	25
Total		15	20	39	26	48	35	28	9	15	62	50	347

TABLE 3: Analysis of Books on Economics in Korea by Sub-category

Classi- fication		1879-1909	1910-1945	1945-1950	1951-1960	1961-1965	1966-1970	1971-1975	1976-1979	Total
000	010	7	3	13	34	64	26	55	60	262
	020	0	1	0	3	4	3	6	13	30
	030	0	2	1	7	4	2	6	6	30
	040	0	11	12	9	19	26	43	25	145
	050	1	0	6	2	5	3	5	1	23
	Sub-total	8	17	32	55	96	60	115	105	488
100	110	0	0	1	13	8	8	7	15	52
	120	1	7	10	22	20	10	25	24	119
	130	0	0	2	0	4	2	5	1	14
	Sub-total	1	7	13	35	32	20	37	40	185
200	210	0	4	2	8	9	4	20	18	65
	220	0	0	0	0	1	0	1	1	3
	Sub-total	0	4	2	8	10	4	21	19	68
300	310	0	3	1	11	19	12	8	7	61
	320	1	0	2	14	22	16	17	28	100
	330	0	0	1	1	8	1	2	1	14
	Sub-total	1	3	4	26	49	29	27	36	175
400	410	1	0	0	4	3	2	11	12	33
	420	0	1	0	1	1	1	14	10	28
	430	0	0	0	2	3	4	6	8	23
	440	0	0	0	0	1	1	3	4	10
	Sub-total	1	1	0	7	8	8	34	34	93
600	610	0	0	0	2	2	3	5	5	17
	620	0	0	0	0	0	0	1	1	2
	630	1	0	0	1	4	2	2	6	16
	Sub-total	1	0	0	3	6	5	8	12	35
700	710	0	20	12	9	22	12	33	13	121
	720	0	0	0	0	0	0	1	4	5
	730	0	0	0	6	1	0	0	0	7
	Sub-total	0	20	12	15	23	12	34	17	133
800	810	0	0	0	0	0	4	3	2	9
	820	0	2	0	0	2	1	3	9	17
	830	0	0	0	4	2	5	7	4	22
	840	0	0	1	1	1	1	5	2	11
	850	0	0	0	0	0	1	0	2	3
	Sub-total	0	2	1	5	5	12	18	19	62
900	910	0	0	0	2	4	2	4	3	13
	920	0	0	0	0	1	0	5	2	8
	930	0	0	0	0	1	1	2	1	5
	940	0	0	0	0	0	0	1	4	5
	Sub-total	0	0	0	2	6	13	12	10	33
	Total	12	54	64	156	235	153	306	292	1,272

TABLE 4: Analysis of Translations of Foreign Publications by Sub-category

Classi- fication	Year	1897- 1909	1910- 1945	1945- 1950	1951- 1960	1961- 1965	1966- 1970	1971- 1975	1976- 1978	Total
000	010	10(6)	1 (1)	4(2)	16	8	2	5	4	53 (9)
	020	0	4	3	30	4	0	5	0	49
	030	0	15(11)	28(1)	23	10	3(2)	8	1	91(14)
	040	2	1 (1)	4	13	2	2	4	1	29 (1)
	050	0	16	17	15	8	0	6	4	67
	Sub-total	12(6)	37(13)	56(3)	97	32	7(2)	28	10	289(24)
100	110	0	0	2(1)	15	13(1)	7	8	2	48 (2)
	120	2(2)	0	7(5)	3(1)	2	0	18(16)	7(6)	39(30)
	130	0	1 (1)	1(1)	3	3	0	0	0	8 (2)
	Sub-total	2(2)	1 (1)	10(7)	21(1)	18(1)	7	26(16)	9(6)	95(34)
200	210	0	0	0	3	1(1)	1	2	1(1)	8 (2)
	220	0	0	0	0	1	1(1)	0	1(1)	3 (2)
	Sub-total	0	0	0	3	2(1)	2(1)	2	2(2)	11 (4)
300	310	2	0	0	6	1	2	4	2(1)	17 (1)
	320	0	1	1(1)	4	1	3	1	0	11 (1)
	330	0	0	0	0	0	1	0	1	2
	Sub-total	2	1	1(1)	10	2	6	5	3(1)	30 (2)
400	410	0	0	0	3	2	1	3	1	10
	420	0	2 (2)	0	0	2(1)	0	16(16)	3(3)	23(22)
	430	0	1 (1)	1(1)	1	0	0	1	0	4 (2)
	440	0	3	3(3)	0	0	0	1 (1)	4(1)	11 (5)
	Sub-total	0	6 (3)	4(4)	4	4(1)	1	21(17)	8(4)	48(29)
600	610	0	0	0	0	2	1(1)	0	0	3 (1)
	620	0	0	0	0	0	1	0	0	1
	630	1(1)	1 (1)	0	0	0	0	0	1(1)	3 (3)
	Sub-total	1(1)	1 (1)	0	0	2	2(1)	0	1(1)	7 (4)
700	710	0	1 (1)	3(2)	3	2	2	5 (1)	1(1)	18 (5)
	720	0	0	0	0	0	0	3 (3)	3(1)	6 (4)
	730	0	0	0	1	0	0	0	0	1
	Sub-total	0	1 (1)	3(2)	4	2	2	8 (4)	4(2)	25 (9)
800	810	0	0	0	0	0	0	0	1	1
	820	0	0	0	0	0	1	0	0	1
	830	0	2 (2)	5(4)	4	0	0	1	0	12 (6)
	840	0	0	0	2	1	0	2 (1)	0	5 (1)
	850	0	0	0	0	1	0	0	0	1
	Sub-total	0	2 (2)	5(4)	6	2	1	3 (1)	1	20 (7)
900	910	0	0	0	0	0	1	0	1	5
	920	0	0	0	0	0	0	1	0	1
	930	0	0	0	0	0	0	2 (1)	0	2 (1)
	940	0	0	0	0	1	0	0	0	1
	Sub-total	0	0	0	0	1	1	3 (1)	1	9 (1)
Total (foreign language)		17(9)	49(21)	79(21)	145(1)	65(3)	29(4)	96(39)	39(16)	534(114)

10. Several economists have discussed the task for the Korean economics profession. Their diagnosis differs according to their ideological approach. The neo-classical synthesis approach is taken by, for example, Kim Byungjoo in his "Status and Task of the Korean Economics" in Shin Taehwan et. al. (ed.) *Hankuk Kyungjehak eui Hyunhang kwa Kwaje* (Status and Task of the Korean Economics), Seoul, Cheonyewon, 1983, pp. 185-191.

11. The representative of those who take this approach is Chu Chonghang. See his "The Crisis of Modern Economics and the Korean Economics" in *Hyundai Sahoe* (Summer 1981), reprinted in Shin Taehwan, et. al. (ed.), *op. cit.,* pp. 121-144.

12. There are several who take this approach. See, for example, Cho Soon, "On the Korean Economics", a contribution made on the occasion of receiving the Dasan Economics Prize to *Korean Economic Daily,* October 29, 1982, reprinted in Shin Taehwan, et. al. (ed.) *op. cit.,* pp. 178-184, Byun Hyungyoon, "Direction for the Korean Economics" in *ibid.,* pp. 172-77, and Lim Wontaek, "Task of the Korean Economics", in *ibib.,* pp. 165-167.

TEN

SOCIALIST REPUBLIC OF VIET NAM: *Dao Van Tap*

I. History

The Socialist Republic of Viet Nam is a young nation founded in August 1945 as Democratic Republic of Viet Nam; in 1976, Viet Nam adopted its present offcial name as the Socialist Republic of Viet Nam. The economic science of the country, is, therefore, very young.

Before writing about teaching and research in economics at present, it is perhaps relevant to look back briefly on the source of the ideas which are guiding the work being done now.

The outstanding and earliest researcher and teacher in Vietnamese modern history was Nguyên Ai Quôc, better known as President Hô Chi Minh.

When Viet Nam was a French colony, Nguyên Ai Quôc left the country and travelled to many parts of the world in search of a way to liberate the country and improve the life of the people. He was both a revolutionary and a scholar. For him, the study of the pressing problems of the Vietnamese society, like other colonial countries, was linked with the training of revolutionary cadres for mass agitation. For realization of his objectives he founded the Indochinese Communist Party which later became the Viet Nam Communist Party.

Among the numerous books and articles he wrote during the time he live abroad, mention should be made of the two books: *Indictment of the French Colonialist Regime (1925)*, and *The Road of Revolution (1927)*.

The first book consists of 12 chapters, the opening one is entitled *Blood Tax* and the concluding, *The Awaken Slave*.

Nguyên Ai Quôc pointed out that colonialism, an offshoot of capitalism, was the common enemy of all the oppressed peoples.

He wrote: "Capitalism is a leech which has one sucker stuck to the proletariat in the metropolitan country and the other to that in the colonies. To destroy it, one should cut off both suckers at the same time."

The second book *(The Road to Revolution)* is a text-book on revolutionary theories and methods of revolutionary agitation. Needless to say, these theories and methods were closely related to the socio-economic formations and the strategy of their continuous development from the lower level to the higher one. Nguyễn Ai Quốc used this material to train a contingent of revolutionary activists in various fields: political, military, economic, cultural, etc.

The writings of Nguyễn Ai Quốc's and his disciples on the economic, political and social life of Viet Nam were incorporated into a historic document entitled *Political Programme of the Vietnamese Communist Party,* published in 1930, at the founding of the Party. The Political Programme pointed out the fundamental socio-economic characteristics of the then Vietnamese society and the revolutionary road proposed to be followed in order to attain independence for the nation, give land back to the tillers, and to advance socialism and communism.

Viet Nam is an agricultural country. Peasants make up the overwhelming majority of the population with three-fourth of the population living in rural areas.

The Vietnamese revolution owed its success mainly to the close alliance between the working class and the peasantry, a solid worker-peasant bloc. Prior to the liberation, national leaders such as Le Duẩn, Truong Chinh, Vo Nguyên Giap, studied peasantry economy, life, mentality and political tendency, and came to the conclusion that the peasants are an enormous potential revolutionary force and that they should be drawn into the revolutionary struggle.

In short, prior to the liberation, research and training were directly in the service of the revolution; economic research and socio-political research were closely linked; the teaching of economic knowledge was part of the training of cadres who were to be well-versed in revolutionary theories and methods of revolutionary agitation.

With the success of the August Revolution and the founding of the Democratic Republic of Viet Nam, economic training and research entered a new era, its objective now being to serve the cause of national *renaissance* combined with that of national *defence*. In other words, this meant that the work of training and research was to serve the political tasks of the nation. There was no other alternative.

During the nine years of resistance against the French colonialists (1945-1954), the general guideline, drawn by President Hồ Chi Minh, was "to wage a resistance war and to build the country simultaneously". This guideline governed all aspects of activities of the State, the revolutionary armed forces and the people on the front as well as in the rear area. Besides, the war conditions required changes in all activities of the society. While circumstances were not appropriate for the establishment of regular scientific research organs, the units leading the resistance had themselves to undertake research works. The different stages of doing research, drawing projects, and organizing their implementation were co-ordinated by the Ministry of Economy. The essential content of economic research then was oriented to organizing and building a resistance economy of a democratic character, relying mainly on the people's resources (the country being encircled and blockaded on all sides). To step up production with a view to realizing self-supply, ensuring self-reliance, and to meeting the requirements of the army and people - this was the core of the resistance economic line.

Training and research in economics during this period was guided by the following objectives: (i) to meet the urgent needs of the resistance war for national salvation, and (ii) to prepare conditions for post-war national construction.

To meet the first objective, economic guidance organs opened short-time courses, on small scale, and at shifting locations (for security reasons), to train economic and technical cadres, at medium and primary levels, for such branches as national defence, industry, agriculture, transportation, postal service, communications, finance, trade, and banking. It should be stressed here that these "economic and technical cadres" were usually cadres for mass agitation and political work; it was their duty to organize and help the people and the army in carrying out their activities in the service of the resistance war for national liberation.

The formation of a contingent of economic and technical experts for post-war reconstruction required sizeable, long-term training courses with regular curricula and teaching methods. Under the war conditions, such courses could only be organized for two branches, i.e. health and pedagogy. For other high technological branches, the training was given with the generous help of the friendly countries. During the last years of the resistance war against the French colonialism, hundreds of military and civilian cadres, the writer of this report among them, were sent abroad for studies and research. They returned to serve the homeland when the French expeditionary troops had left Viet Nam for good. However, the country was again involved in a new fight, this time with the US forces, which went on for 20 years (1955-1975).

During these 20 years, the economists of Viet Nam had extremely strenuous and complex tasks. On the one hand, research and training was needed for the reconstruction and development of the country (in the North) along the socialist road; on the other, people had to participate in the resistance war, the liveration of the South and the reunification and territorial integrity of the country.

Since 1975, when the country was completely liberated and reunified, economic science again redifined its tasks: to serve the building of socialism in the nation as a whole, and to defend the country against new acts of aggression.

With peace restored after the war and national renaissance started, economic science has a favourable climate to develop and to contribute to the economic development of the country.

The first important event was the founding of the Central Economy-Finance School in 1955; in 1958, the School was converted into a university; i.e. the *University of Economy and Planning*. Thus, the first base of the country has been set up for economic training and research at graduate and post-graduate levels. During its 25 years' existence, the University, with its several specific branches, has produced several experts and has undertaken research on different aspects of economy.

Following the University of Economy and Planning, a considerable number of other economic colleges and middle schools were founded, with specialization in areas, such as foreign trade, foreign affairs, transport economy, accounting, finance, banking, trade and pricing.

In 1974, the State decided to establish the *Political Economy Faculty* within the National University of Hanoi. The country now has a large number of economic universities and faculties and economic vocational schools, which turn out thousands of graduates every year needed for teaching and scientific research in various branches of the national economy, and for providing additional professional training to the cadres working in the Party and State organs from the central to provincial and grass-roots levels.

Together with the establishment of economic universities, faculties and schools whose main function is training, institutes of economic science research have gradually been set up, such as (i) the *Economic Institute* and the *Institute of World Economy* of the Viet Nam Social Sciences Committee; (ii) institutes belonging to the Council of Ministers, State Committee and Ministries in the economic sector -- the *Institute of Planning and Quotas Method* of the State Planning Commission, *Institute of Economic Management* of the Council of Ministers, *Institute of Trade* of the Ministry of Domestic Trade, *Institute of Foreign Trade* of the Foreign Trade Ministry, *Institute of Agricultural Economics* of the Agriculture Ministry. *Institute of Forestry Economics* of the Forestry Ministry, *Institute of Financial Science* of the Ministry of Finance, etc. Almost all research institutes and economic ministries have their own journals and bulletins, the most important of which is the bi-monthly *Economic Research* journal.

It will be a great mistake if we do not take appropriate consideration of the economic faculties of the local and central Party's schools and their extremely important role in the propagation of the Party's economic policy and theoretical knowledge to the local and central Party and State departments' leaders. With their defined function, the Party's schools often concentrate on political economy, agriculture, industry, distribution and circulation, and economic management.

The important role of the economic management science has been increasingly recognized by the Party and the State, therefore this discipline has turned to be almost obligatory to the leaders at different levels. By the end of the 1970s and early 1980s the teaching of management knowledge for high-ranking leaders has been further emphasized due to the urgent requirement of the renovation of the economic management system from the war time to peace, from the State subsidy regime to profit-based accountancy. The *Central Economic Management School* of the Party Central Committee was set up to carry out this task; meanwhile middle and high-ranking cadres have been continuously sent to foreign countries to learn about new advances in theories and to gain experience in economic management. Research institutes consider studying of the renovation of the economic management system as one of the important tasks.

The building and development of the national economy has increasingly required highly qualified economists who are able to solve practical and complicated problems. Therefrom arises the need to improve the training quality at university and vocational school level on the one hand and to organize courses for Master and Doctoral degrees. Some universities and research institutes have been given the authority to train post-graduates in economics.

To study the contemporary history of economic research and training in Viet Nam, it is necessary to have a brief review of the situation in South Viet Nam before the year 1975, i.e. the time under the occupation and domination by the United States and its Saigon Administration. 1/

During that period, teaching of economics was conducted under different types of private as well as public schools, In these schools, teaching and research closely linked to each other, but main emphasis was on teaching.

For historical reasons, South Viet Nam followed the French model of higher education for a long period of time, even after the French handed over university institutions to the Saigon Administration. The American influence in teaching and research in economics, as in other disciplines began in the 1960s. Quite naturally, the emphasis was on capitalist theories as contrasted with socialist emphasis in the Universities of North Viet Nam.

As mentioned above, prior to 1960s, having been heavily influenced by the French tradition, economic teaching and research had the following features: (i) close connection between economics and law, (ii) giving more consideration for theoretical aspects while paying less attention to technical matters (e.g. accountancy, banking), and to mathematics and statistics.

Later, at the end of the 1960s, partly influenced by the reforms in economic science in France, but directly and largely influenced by the American academic system, economic science in South Viet Nam began to "Americanize" (though not yet escaped from the French tradition) with following features: separation of economics from law; (ii) politics applied economics, and concrete economic techniques were added, and (iii) statistics, mathematics, econometrics and quantitative methods were introduced. Thus two parallel teaching and research schools came into existence: the classical school with an accent on theoretical aspects, and the "new" school with greater emphasis on the pragmatic and empirical aspects.

Up to 1975, in South Viet Nam there were about ten "public" and "private" universities or their equivalents which carried out the task of teaching and studying. Among them were the *"National Administration Institute"* which trained administrators and economic planners, *the Law University of Saigon* which

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1/ This part is written with the collaboration of Mr. Tran Anh Tuan, a professor of economics working at that time in Saigon and at present the Deputy-in-Chief of the Economic Research Division of the Institute of Social Sciences in Hồ Chi Minh City, belonging to the Viet Nam Social Sciences Committee.

trained administrators and conferred Master's and Doctoral degrees in economics and law. Beside the "public" universities, there were some well-known "private" schools such as *"the Dalat College"* founded by the Church Association, *"the Van Hanh College"*founded by the Buddhist Association, *"the Minh Dức College"* founded by the Association of Christian intellectuals. In these religious colleges, economic faculties were established with teaching and training programmes being more or less different from those of the "public" universities; and beside the objective of doing business (under the old regime education was also regarded a branch of business) these colleges were also aimed at increasing the influence of individual religions which were participating in the fierce competition for political power in South Viet Nam before liberation.

After the liberation of the South and the reunification of the entire nation, the educational and scientific research system was made uniform following the principles of national independence and socialism.

II. The System of Economic Teaching and Research Institutions

As mentioned above, economic teaching and research in the Socialist Republic of Viet Nam has been carried out in the following three groups of institutions:

1. Universities and secondary level vocational schools;
2. Central and local Party schools;
3. Comprehensive and sectoral research institutes of the Ministries and State Committees.

Among the economic universities and secondary level schools, are included the following:

- Hanoi Economic and Planning University
- Hồ Chi Minh City Economic University
- University of Finance and Accountancy
- Foreign Trade University
- Domestic Trade University
- Banking University

Of the above, *the Hanoi Economic and Planning University* has the longest history, and in fact it plays the role of a "mother" university which supplies other economics schools with professors and lecturers. Therefore, it is necessary to speak a little more of this university so that the readers may have an idea of the teaching and scientific research activities of the economic universities in Viet Nam.

The Economic and Planning University has the duty to train two kinds of economics graduates: one, those who are given a general exposure to the various branches of economics; and two, those who specialize in particular field.

In 1983, the 25th year since it was officially recognized as a university, there were 9 faculties which covered 14 specialized fields, as shown below:

1. The Faculty of Industrial Economics
2. The Faculty of Agricultural Economics
3. The Planning Faculty
4. The Faculty of Labour Economics
5. The Faculty of Material Economics
6. The Faculty of Price Economics
7. The Faculty of Econometrics, offering specialization in two fields
8. The Faculty of Statistics, offering specialization in four fields
9. The Banking Faculty, offering specialization in two fields

Besides, the University has three more special faculties i.e. the Faculty of On-the-Job Training, the Faculty of Post-graduate Training, and the Military Faculty.

In order to equip students with a necessary system of knowledge, the teaching programme of the University is divided into groups of disciplines as follows:

1. Disciplines related to theories and methodologies of Marxism and Leninism which account for 18 per cent of the whole learning course of four year.

2. Disciplines in the area of general economics which account for 25 to 30 per cent of the time, depending on individual training fields in which sectoral economics accounts for 17 per cent.

3. Disciplines of specialized fields, 15 per cent.

4. Disciplines of mathematics and foreign languages, 25 per cent.

5. Technical disciplines, 12 per cent.

In the school year 1982-83, the total number of students and post-graduates of the University was 5,911 who were guided for their theses by 440 professors and lecturers.

In the first 25 years, the Economic and Planning University has produced 17,106 graduates in economics; provided training in economics to 4,865 economic and administrative leaders from district level upwards; and gave post-graduate training to several economics lecturers, researchers and managers. The University is one of those which are legally entitled to organize the advocation of theses for different economic science degrees.

Research by the staff and students was carried out on 2,589 topics.

For its achievements and contributions to teaching and research in economics, the University has been awarded *Labour Medals* by the State, four times.

In the Socialist Republic of Viet Nam, the *political economy* is a compulsory (subject in university) not only for economics students but also for all other students in other universities. The other compulsory (subjects) are Marxist-Leninist philosophy, scientific socialism and history of Viet Nam Communist Party. The requirements of economics course for non-economics students are, of course, different from those majoring in economics.

In 1982, there were about 250 political economy lecturers and nearly one thousand lecturers in other areas of economics in all the whole country. To meet the needs of expanding political economy teaching, there has been a project to double the number of lecturers of this subject in the coming years. That is why a faculty of Political Economy was created at the University of Hanoi in 1974.

The objective of this Faculty is to train researchers and lecturers of political economy for institutions of economic research and strategic guidance and leadership, Party schools, and universities.

The training course lasts five years, including the following disciplines:

- Philosophy, scientific socialism and history of the

Vietnamese Communist Party (accounting for about 25 per cent of the course).

- Political economy, history of economic thoughts, economic management science, sectoral economics, applied economics and world economy (about 40 per cent of the total school hours).

- Foreign languages, econometrics and some other disciplines (about 35 per cent of the school hours).

Up to 1983, the Faculty of Political Economy has completed 5 training courses, each of which trained 50 to 55 graduates. (There was one course with more than a hundred graduates). Some of them were later chosen for post-graduate training at home and abroad.

As mentioned earlier, central and local (provincial, city) Party Schools play an important role in research and teaching of economics, especially in such areas as economic thoughts, viewpoints, guidelines and policies of the Viet Nam Communist Party. The Central Party's School, which bears the name Nguyên Ai Quôc, with different numerical signs (depending on the objectives or objects of training) forms the core of the Party's school system. The people who are trained in these schools include the leaders of the Party and the State in the central and local organs: Economic disciplines, e.g. political economy, economic management and some other sectoral economics, make up an important part of the study programme. Other courses are philosophy, scientific socialism, the Party's history, the Party's lines and policies, and the work of building the Party. The Political Economy Faculty and other economic faculties (particularly the Faculty of Economic Management) are the strong faculties in the central *Nguyên Ai Quôc High-Level Party School*. For over ten years now, the High-Level Party School has opened new courses to train post-graduate economic theorists with a view to supplying more researchers and lecturers for universities and other institutions.

The main institutes engaged in comprehensive economic research in the Socialist Republic of Viet Nam are the *Institute of Economic Management Research* of the Party's Central Committee and the Council of Ministers, the *Institute of Economics* and the *Institute of World Economy* of Viet Nam Social Sciences Committee. *The Institute of Economics Management Research,* is charged with the responsibility to study projects for the building and improvement of the economic management mechanisms, from planning to policy-making levels, with a view to orientating the development of the national economy to the chosen objectives. This institute is playing an important role as a consultant of the Party's Central Committee and the Government in the field of economics.

The institute of Economics and the Institute of World Economy are engaged in fundamental research. Their main task is to study theoretical and scientific bases for determination of strategic economic guidelines of the Party and the State. These institutes also supply teaching staff for economics courses at the universities and Party's schools.

The Institute of Economics at present is concentrating its efforts on studying "macro-economic" problems: the revolutionary changes in production relations in economic structure, and in economic management mechanism; and the theoretical and methodological questions related to development of socio-economic strategies. The institute is also assigned the task to study the contemporary history of Vietnamese economy.

The Institute of World Economy studies the past changes and development tendencies of the world economy (which is divided into regions and groups of nations), and therefrom draws conclusions and experience which would be useful for the making of domestic socio-economic development strategies and policies as the orientations and policies in foreign economic relations.

The research reports of the above institutes are submitted to the responsible authorities of the Party and State. They are usually published (in journals or as independent books), and used as teaching materials.

Economic institutes of the State committees and ministries provide consultancy to the corresponding committees and ministries. In principle, they are assigned to study and draft development projects and measures to organize the implementation of economic decisions.

In the Socialist Republic of Viet Nam, the expenditures on teaching and research have so far been basically covered by the subsidies given by the State. The system of research contracts has just begun. In the field of economic sciences, the system of research contracts has not yet gained enough currency. Therefore, research is often directly commissioned by the Council of Ministers, the State Committee and ministries. The work plans of research institutes are parts of the State plans, the ministries' and State Committees' plans. Thus, funding has never been a serious problem. However, difficulties are encountered in the implementation of research plans and in the utilization of research results.

III. Main Research Orientations

In Viet Nam now, scientific research in general, and economic research in particular, is guided by the socio-economic objectives defined for the country's development.

The review of the main development phases of economic research and teaching in contemporary Viet Nam indicates two aspects of the research work: first, the economic problems of the period of *national people's democratic revolution* and second, those of the period of socialist revolution.

Prior to the August 1945 Revolution, the research focussed on the analysis of the economy of the Vietnamese colonial and semi-feudal society. The research work at that time was aimed at awakening the Vietnamese people and making them aware of the necessity of the struggle for national liberation for independence and freedom of the nation. The research works of Nguyễn Ai Quốc, Lê Duẩn, Truong Chinh and Vo Nguyên Giap were important contributions to the studies of colonialism. An outstanding feature of these works was the close combination between the scientific analysis and the revolutionary orientation. They proved to be exemplary works and opened new vistas for research in economics.

For the period of resistance war against the French the theory and policies of the economy of resistance and democracy were reflected in documents and works circulated among the freedom fighters.

From these documents, following viewpoints and policies related to Vietnamese economy can be drawn:

- Resistance and economy are organic parts of the national body politic. "Abundant in food, mighty in military force", was the slogan given by President Hồ Chi Minh.

- To step up production for self-supply, self-reliance is the only way for a country in a continuous condition of war, and thus suffering from relative isolation. The measure of strategic significance, for the realization of this objective is to mobilize all the civilians and army units, from the rear to the front, to step up production, taking farm production as the backbone, at the same time paying adequate attention to the development of handicraft and small industry and ensuring economic intercourse between different parts of the country. The resistance economy, thus had a well-defined populist character, known as the "economy of people's war", "economy of people's resistance."

Relying on the people's strength to fight and to defeat the enemy, this strategic thought has become a tradition of the Vietnamese people .

- Resistance should go hand-in-glove with national construction. This means that while carrying on the resistance war, efforts should be made to build the country, by developing the most needed material bases such as national defence industry, civilian industry, roads and bridges, state banks, state trade, and mechanized transport units.

The stress of democratic economy is on the distribution of land to the peasants who are a social force making up the overwhelming majority of the population. The Vietnamese experience had shown that without a policy meeting the peasants' fundamental, and urgent needs, it would have been impossible to mobilize the enormous and mighty force into the struggle for national liberation.

In addition to the economic questions of a general theoretical significance mentioned above, economic thinkers in Viet Nam also addressed themselves to more concrete and important problems of the resistance economy, such as: development of agriculture, industry and trade; the resistance government's finance; the issuing of the National Bank's currency and the monetary control in the war conditions; economic intercourse between the different zones which were under the control of the revolutionary power; struggle for the protection of the resistance economy; orientations and ways to ensure the living conditions of the army, cadres and people etc. Without any ready-made "blueprints", Vietnamese economists had to seek and initiate ways to help the Party and Government to solve the above-said problems in the extremely complex conditions of an agricultural, under-developed country engaged in war with a mighty nation.

However, what is more difficult and complex for Vietnamese economic sciences is that they have to study to find correct resolutions to the economic problems of the transitional period (from colonial capitalist economy to socialism) in a country which is economically, scientifically and technologically underdeveloped and which has been ravaged and devastated by successive wars.

During the first 5 years (1955-1959) after the complete liberation of the North, our economic sciences began to feel their own way and paid all their attention to the problems of peace, recovery and reconstruction of the country. However, the goal of socialism has been affirmed. The Vietnamese revolution now took a turning point. Vietnamese economic sciences also entered a new phase of development with two corresponding tasks:

to carry out research on the problems of building a socialist economy in the North, and to critically review the economic path pursued in South Viet Nam under U.S. inspiration.

A question of important significance is the research on the socio-economic features of Viet Nam when it enters the transitional period in the building of socialism and on the economic laws operating during this period. The more the building of socialism progresses, with its achievements and difficulties, the stronger the attraction for the said question becomes. For only by a scientific analysis of those features and laws can one define correctly the socio-economic objectives and the ways, forms, and steps to be taken for the realization of those objectives.

From a different angle, one can mention several features of the Vietnamese society when it enters the transitional period; but the greatest and most essential feature is that a society characterized by an economy of small production, is advancing towards socialism by-passing the stage of capitalist development. This feature decides the choice of ways, forms and steps for the successful building of socialism in Viet Nam with a new socialist regime, economy, culture and the new socialist man. These "new things" are intertwined and are mutually interacting.

If small scale production is the starting point, large-scale production must be the objective to be attained. However, it does not imply any large-scale socialist production; i.e. a production based on the concept of public socialist ownership of the means of production, with large industry serving as the material-technological basis and planned development. To attain this objective, it is necessary to undertake *transformations* in the field of production relations, to carry out national industrialization, to build and unceasingly improve the system of economic management, with planning taken as the kingpin; and to give full play to the working people's right to collective mastery on all spheres of production, distribution, and management of the national economy. These are the questions that Vietnamese economists are now studying.

To acquire an understanding of the starting point, the objective to be attained, and the means to attain it, economic sciences must abide by an appropriate method of research. The basis for such a method is Marxism-Leninism, particularly the principle of historical materialism, the pivot of which is the Marxist theory of socio-economic formations. Besides, economics must collaborate with other branches of social sciences such as philosophy, history, and sociology.

The Vietnamese Communist Party has come to the conclusion that the general lines and objectives mapped out for the entire transitional period must be concretized into *socio-economic strategies* and *development plans,* in conformity with the actual historical conditions of the country and the requirements and capacities of the nation in each stage of the transitional period.

So, before and after the Fifth Party Congress (March 1982) the social sciences in Viet Nam had a new orientation for research: to define the scientific basis for the division of the transitional period into different stages and the strategies and plans of development in keeping with the requirements and the capacities of the country during each stage of this period.

In this connection, the knowledge of the general laws of the transitional period and the compiled experience of the advanced socialist countries are of great help to the Vietnamese scientists. However, the task assigned to Vietnamese scientists is that they should proceed from the realities of their own country in doing research and seeking solutions to the problems. As the historical conditions and the development process of different countries are not similar, the division of stages and the content of each stage are likewise not similar.

In the research on strategies of development for the coming years, there are two great and complex problems: first, the policy of *economic structure,* and second, the *mechanisms of economic management.* The research objective of the first problem is to concretize in reality "the economic structure of modern agriculture and industry", laid down in the resolution of the Fourth Party Congress. It must be concretized at the level of national economy as well as for each key economic zone, each province, and district. The research objective of the second problem is to renovate the mechanism of economic management, the essence of which is to change the managerial mechanism charaterized by a bureaucratic and state-subsidy regime into a managerial mechanism founded on the principles of profit-based accounting and socialist mode of doing business.

The Vietnamese economists and other social scientists are collaborating with each other to find solutions to these questions in order to provide scientific bases for the working out of economic strategies and the development plans for the remaining 5 years of the 1980s and also for the 1990s.

With more and more attention given to the socio-economic problems of the transitional period and other pressing actual problems, such as economic structure and managerial mechanism, Vietnamese economic sciences are getting ever more closely linked with the realities of the economic life. This trend is reflected both in the themes chosen for research and study and in the revised syllabus of political economy.

IV. Problems of the Profession

While all disciplines needed for the development of economy as well as the development of the economic sciences themselves exist in the system of higher education there is still a need to improve the quality of training in theory and practice.

However, considering both the immediate demand and the future demand, the following areas in the discipline should be given priority: economic cybernetics, history of economic theories, history of national economy, history of world economy, analysis of economic activities, and demography. To start or broaden the training of experts in these areas, there are, naturally, the immediate difficulties as regards infrastructure; but what is more important is the training of teachers themselves.

As regards duration of training at present only 4 years' study is required in the university; a small number of other disciplines (such as political economy) need 5 years. Realities show that the present tenure of training has posed no particular problems; but the problem is to improve the utilization efficiency of the time and fund allotted for teaching. At present, the time spent in the classrooms is much greater than the time given to the students for self-study. One of the main reasons for this situation is the lack of books and reference documents. Thus the students have to depend mainly on class lectures.

In principle, university graduates are assigned by the State to posts in the central organs and the localities. During the recent years, the percentage of graduates assigned to various localities has markedly increased. After two years' probation, they become qualified officials of the State or the people's organizations. Later, depending on individual efforts and progress, they may be qualified as lecturers or researchers. The time needed for conferring the said titles is from 3 to 5 years after probation. Quite a number of persons, right after their probation, were chosen for post-graduate studies, for the defence of candidate's (the equivalent of Ph.D.) thesis in economic sciences. Teachers at schools are encouraged to do research work while researchers in research organs, who have sufficient qualifications, are encouraged to take part in teaching at schools. They are also allowed to publicize their research provided it is of acceptable quality.

Depending on the quality and the results of research, they may be published openly, semi-openly, or just circulated within restricted circles. The utilization of research depends on the extent of their relevance to the State plans. The signing of research contracts is the firmest guarantee for the utilization of research. However, it should be added that the signing of research contracts must not proceed only from the immediate interests; narrow-mindedness in the signing of research contracts may eventually affect the all-sided research programme, particularly as regards the research subjects of fundamental significance. Advisably, the State and various managerial scientific organs should have a comprehensive policy towards teaching and scientific research.

In Viet Nam, the contingent of cadres doing teaching and research in economics has come up to thousands. The integration of their activities to promote their collective minds and the encouragement of individual efforts are an urgent requirement now. In this connection, two steps are being taken:

First, broadening the membership and stepping up the activities of the Association of Economic Sciences, which was founded in 1960s.

Second, setting up a Section of Economic Sciences, directly under the Committee of Social Sciences (eventually the Vietnamese Academy of Sciences).

Vietnamese economists get in touch with international economic sciences in several ways. The Vietnamese Association of Economic Sciences is a member of the International Association of Economic sciences (A.I.S.E.).

Viet Nam is one of the countries whose delegates attended the Congress which founded the *Third World Association of Economists (A.E.T.M.)* and at present, the Vietnamese representative is a member of the Association's Executive Committee.

Vietnamese economic institutes and schools sign co-operation agreements with their counterparts in the socialist countries and other countries. The prevalent forms of co-operation are: exchange of research workers, mutual assistance in training experts, and collaboration in realizing research subjects. The results of this co-operation are positive for the development of economic sciences in Viet Nam.

V. Agenda for the Future

In the past forty years, Viet Nam has passed through several vicissitudes, and is presently engaged in the task of building a socialist society.

The history of fighting for the independence and building of the nation is also the history of the development of the economic sciences and other social sciences. Indeed, Vietnamese economists have had to solve acute problems in extremely difficult conditions and severe privations; some of these difficulties and privations are caused by continuous wars, but they are basically the consequences of an impoverished and backward economy left over by history.

Despite all that, the economic sciences have made note worthy achievements in teaching and research, and in the application of the results of research.

The achievements in economics already recorded in the previous pages envisage the fundamental problems of the future as well.

There is a need to enhance the number of Vietnamese economists and improve their quality by exposing them to recent advances in economic sciences. It is necessary to combine full-time training with periodical complementary courses for on-the-job cadres. Communication of economic science information and communication of economic information should be stepped up and improved. Appropriate, effective, and economical forms should be found to combine teaching at schools with practice in the real life situations. Lastly, it is important to improve the programme and the syllabus of the teaching of economics by reserving a more proper place for the problems of political economy of the transitional period.

While affirming that the basic objectives, ways, forms and steps for the building of a new economy in Viet Nam have been found, it does not follow that everything is going well. Not only in the sphere of tactics, but also in that of strategies, the problems of ways, forms and steps remain of contemporary significance on the scale of the entire national economy as well as for each economic branch, locality and grass-roots units. Several questions are being raised which call for a continued clarification as regards the building and consolidation of the regime of collective economy, the development of production forces, the distribution and circulation of products, the policy of accumulation and consumption, and particularly the style of economic management. There are also questions raised as to the relationship between the inner development and the co-operation or *interaction* with foreign countries. It should be emphasized that economic relations with foreign countries remain a new sphere of activities for Viet Nam, a country which, for three decades, had to concentrate on the fight for independence and freedom.

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